

No. 828,617.

PATENTED AUG. 14, 1906.

G. MAASS.  
LUBRICATING PAD FRAME.  
APPLICATION FILED OCT. 18, 1905.

Fig. 1.

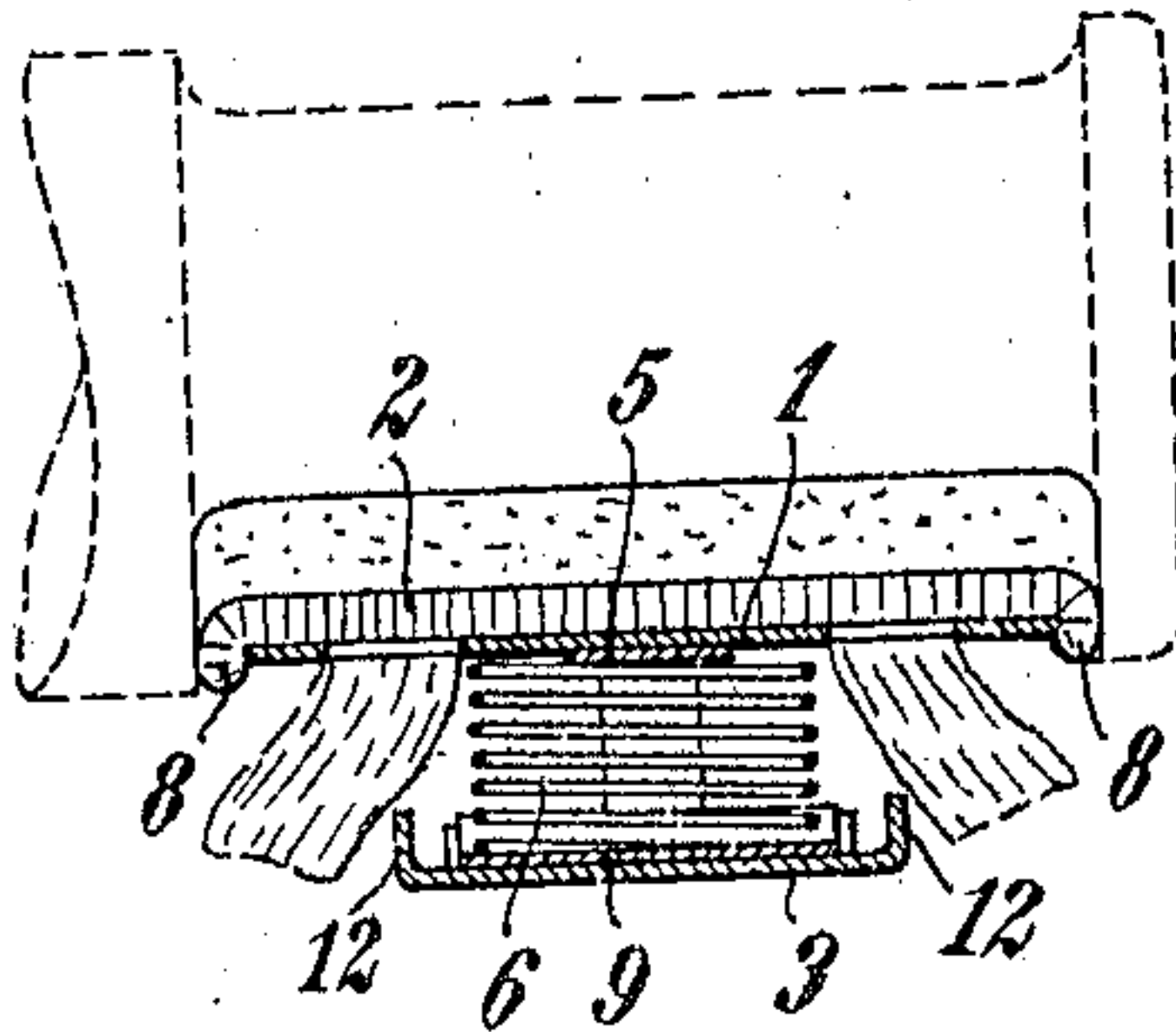


Fig. 2.

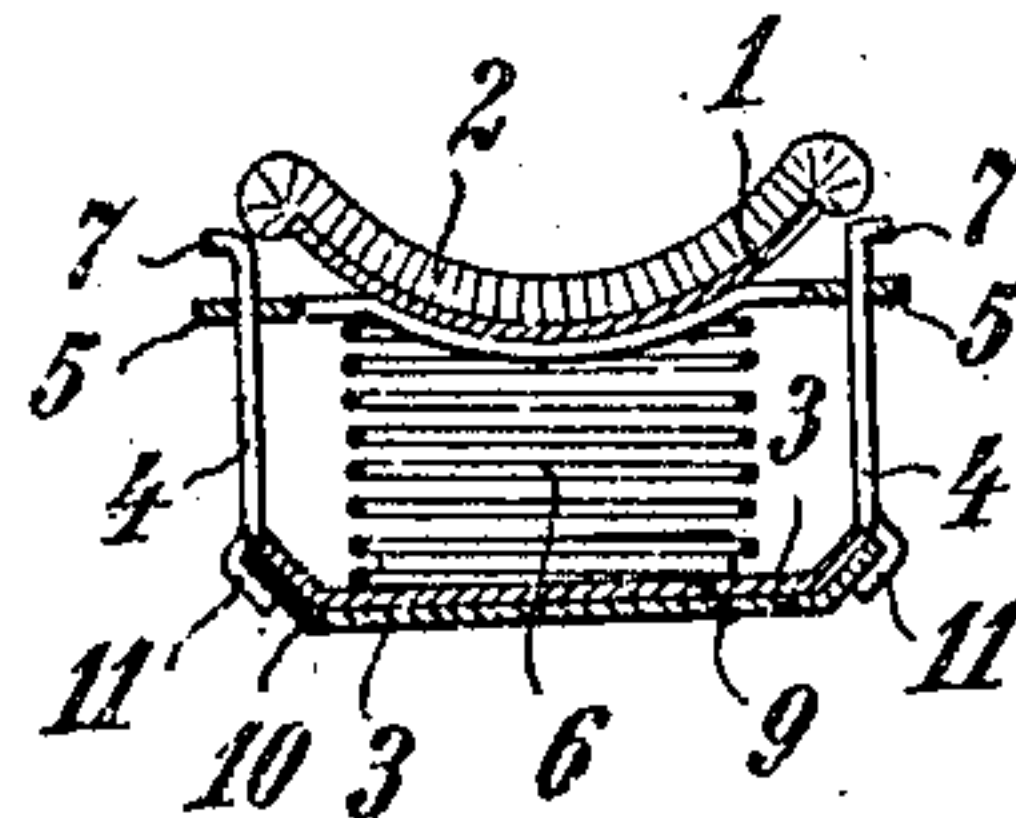


Fig. 3.

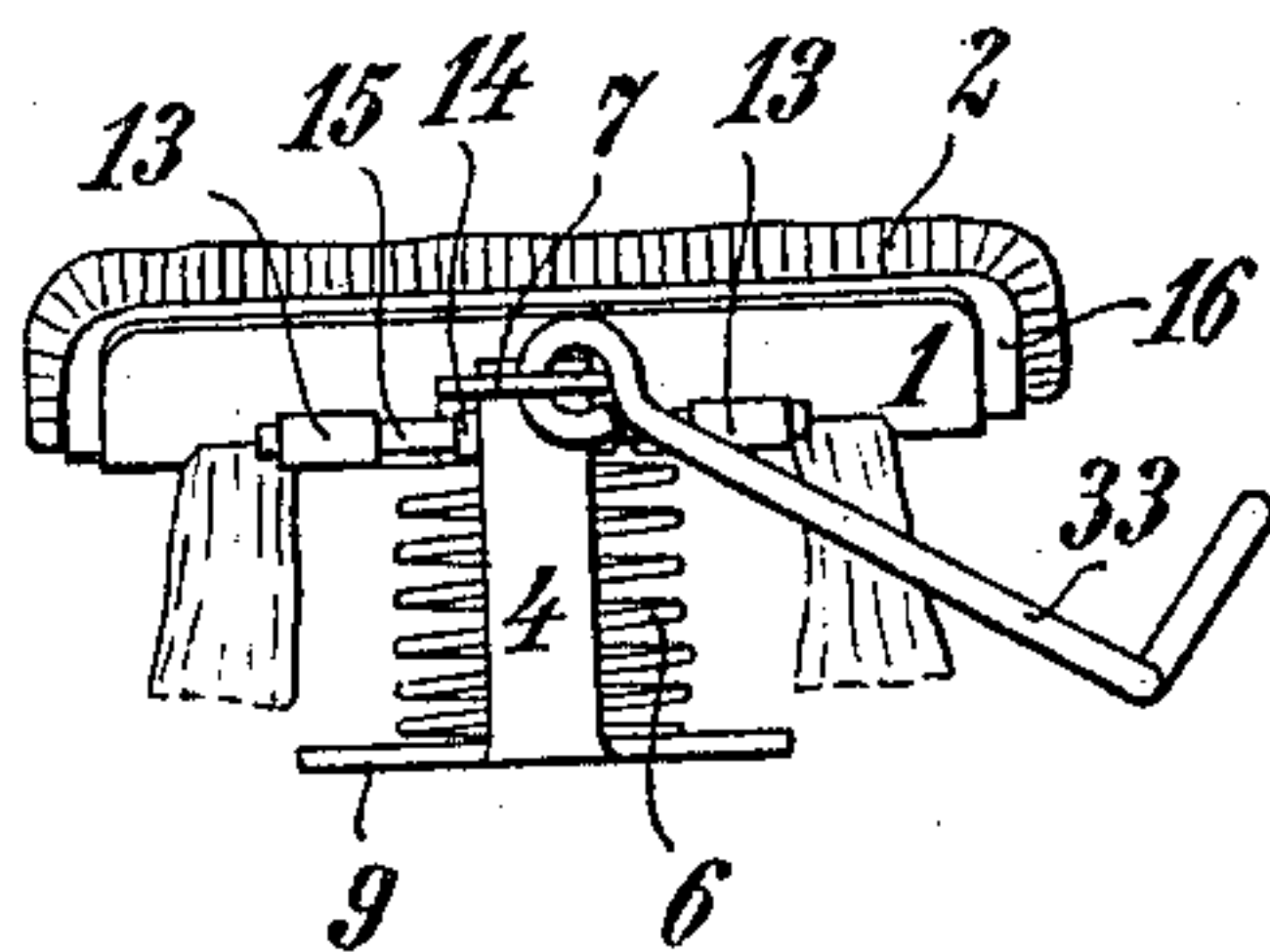


Fig. 4.

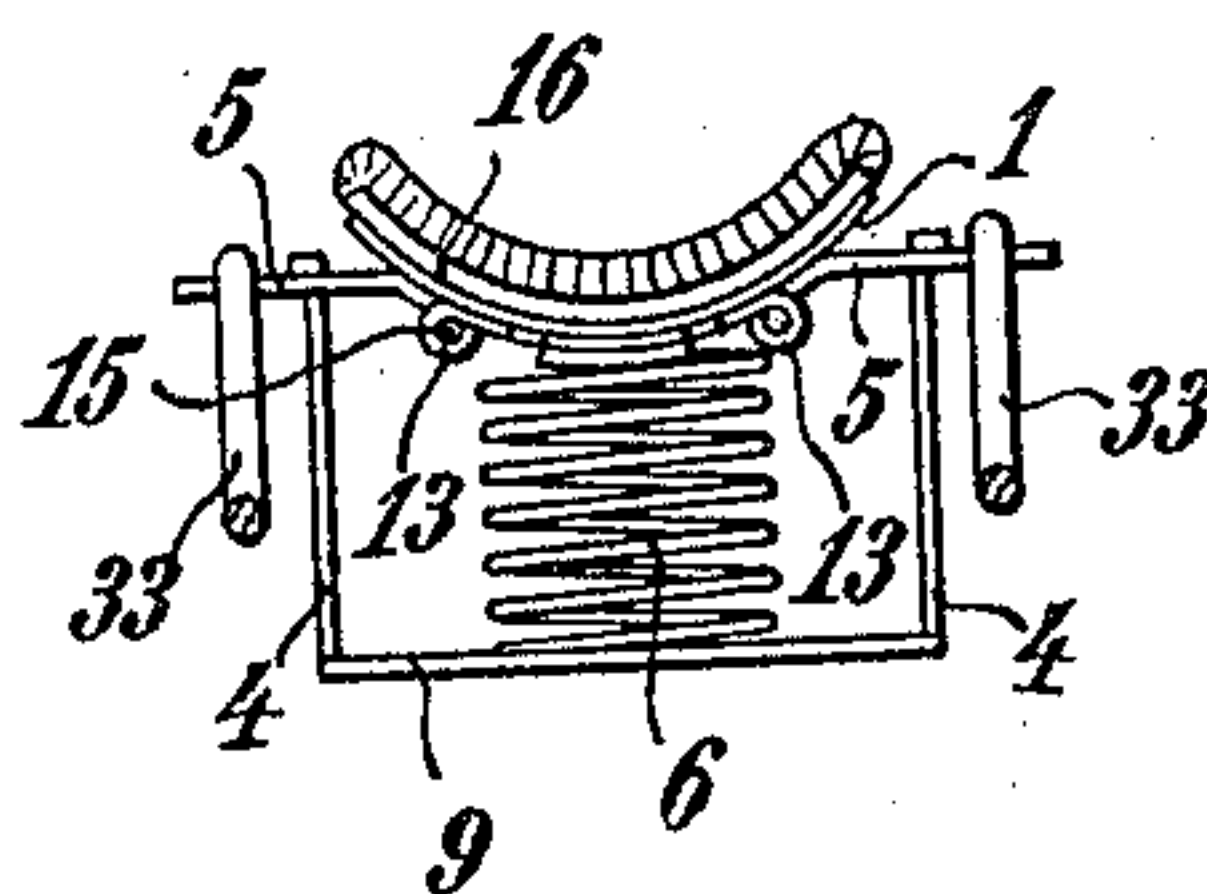


Fig. 5.

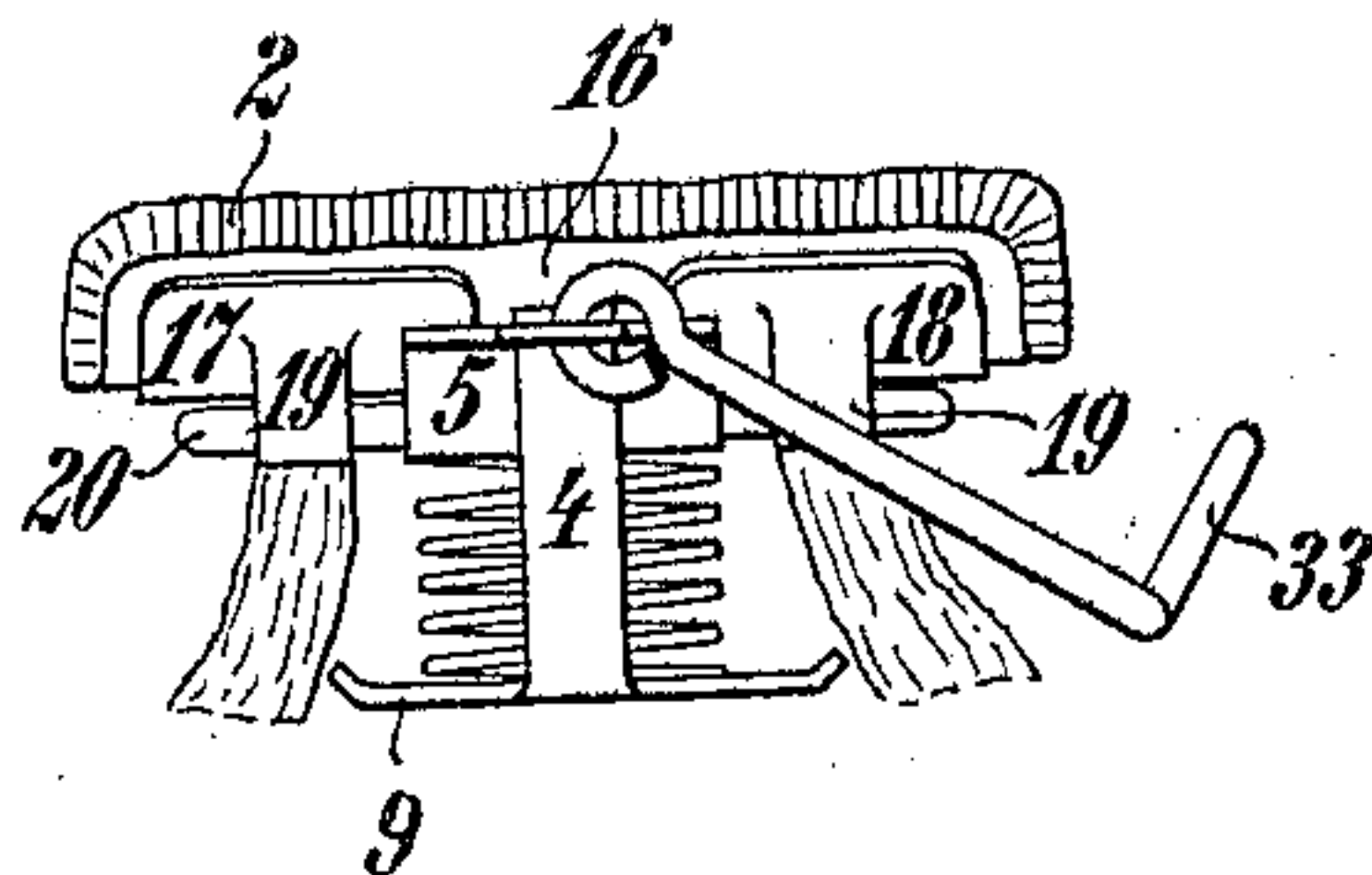


Fig. 6.

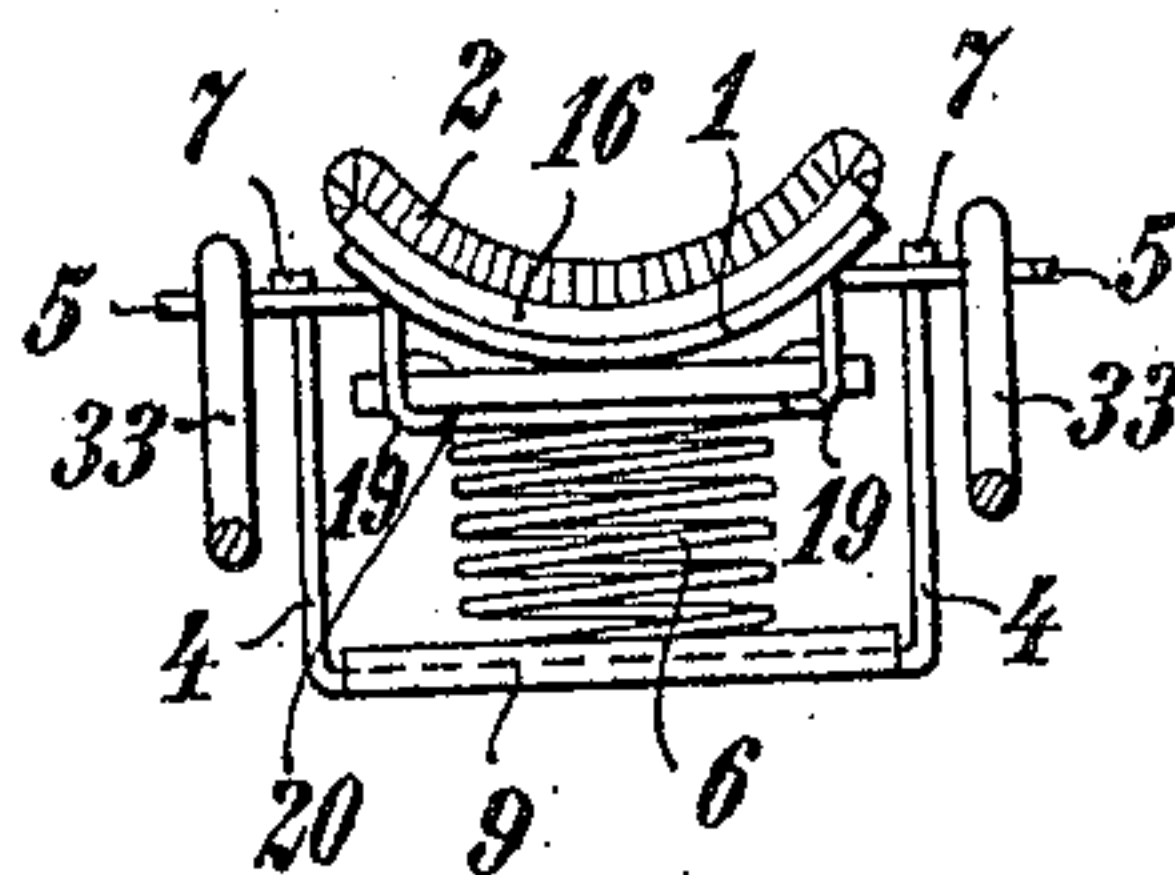
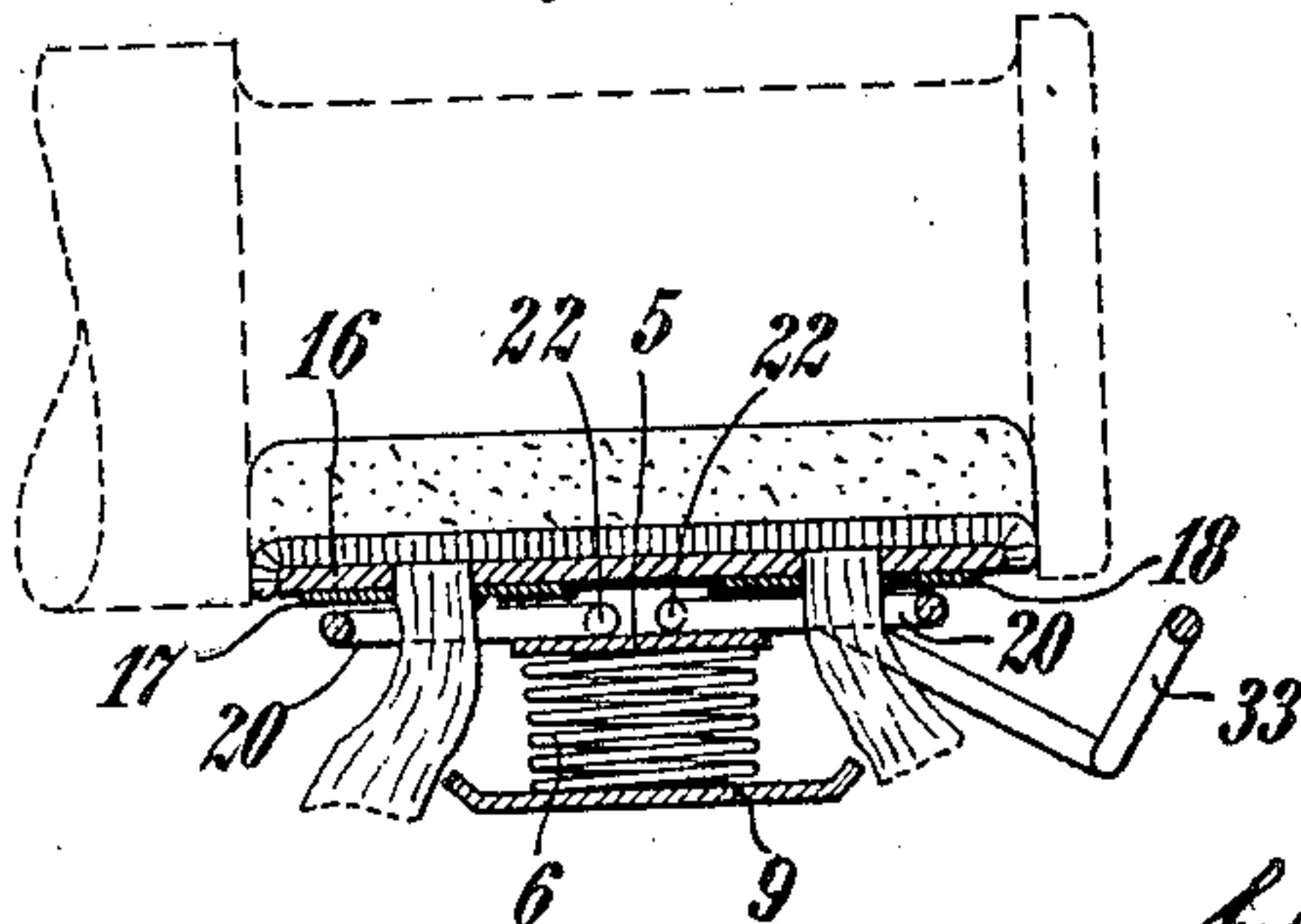


Fig. 7.



Witnesses:

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# UNITED STATES PATENT OFFICE.

GOTTFRIED MAASS, OF DUISBURG, GERMANY.

## LUBRICATING-PAD FRAME.

No. 828,617.

Specification of Letters Patent.

Patented Aug. 14, 1906.

Application filed October 18, 1905. Serial No. 283,243.

*To all whom it may concern:*

Be it known that I, GOTTFRIED MAASS, a citizen of the German Empire, residing at Duisburg, in the Kingdom of Prussia, Germany, have invented certain new and useful Improvements in or Relating to Lubricating-Pad Frames for Axles of Railway-Cars; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

This invention relates to such lubricating-pad frames for axle-boxes of railway-cars and the like.

This invention has for its object to make such lubricating-pad frames applicable also to longitudinally-movable axles, and thus to prevent the cutting of the lubricating-pad carrier, usually made of iron plate, into the rounded-off portion of the axle-journal.

Several constructions of the device according to this invention are illustrated by way of example in the accompanying drawings, in which—

Figure 1 is a longitudinal section through the frame; Fig. 2, a cross-section thereof; Fig. 3, a side elevation of another construction of the frame; Fig. 4, a front elevation of the frame shown in Fig. 3; Fig. 5, a side elevation of a third construction of the frame; Figs. 6 and 7, a front elevation and longitudinal section of the frame shown in Fig. 5.

The frame shown in Figs. 1 and 2 is constituted by the top plate 1, forming the support or carrier for the lubricating-pad 2, and a bottom plate 3, a helical spring 6 being arranged between the two and pressing the lubricating-pad frame from below against the axle-journal shown dotted in Fig. 1.

The top plate 1 is secured to a cross bar or part 5, the ends of which are provided with slot-shaped openings, through which pass vertical side guides 4. Owing to the latter being bent at their upper ends at 7, a slipping off or disengagement of the bar 5, and therefore of the top plate 1, from the guides is precluded.

In order to enable the top plate to move longitudinally relatively to the bottom plate, the vertical guides 4 are not connected directly to the bottom plate 3, but are made longitudinally adjustable relatively to the latter. To that end a second plate 9 is mounted on the bottom plate, and the guides are secured to said plate. The edges 10 of

the bottom plate 3 parallel to the axle are bent upward, while the edges 11 of the plate 9 are folded round the said longitudinal edges. They form thus together an angular rectilinear guide, which makes a longitudinal movement possible without the plate 9 moving on the bottom of the axle-box.

The edges 12 of the bottom plate 3 extending transversely of the axle are bent up at a right angle in order to prevent the plate 9 from sliding off from the plate 3.

The construction illustrated in Figs. 3 and 4 differs from that shown in Figs. 1 and 2, as the longitudinal guide is arranged at a different point between the frame parts. In this construction the pad-carrier 1 is not secured to the transverse bar 5: The pad-carrier 1 is provided with four eyes or sockets 13 and the cross-bar with two eyes or sockets 14, arranged in such manner that a rod or a wire 15 on either side can be passed through two sockets 13 and one socket 14. This wire can be secured either to the sockets 13 or to the sockets 14. The action is the same in both cases, viz: the pad-carrier can be shifted longitudinally relatively to the cross-bar, only in one case the wires move with the pad-carrier and in the other case they remain stationary.

In the construction illustrated in Figs. 5, 6, and 7 the cross-bar 5 is slidable vertically upon the vertical side guides 4 in the same way as in the preceding construction. Two brackets 20 are connected to the cross-bar 5, the pad-carrier sliding on their lateral parts parallel to the axle by means of eyes or sockets 19. The pad-carrier in this case is not in one piece, however, but is divided in the center transversely of the axle, and thus forms two parts 17 18, which can make longitudinal movement independently of each other. For bridging over the intermediate space between the two plates 17 18 the lubricating-pad 2 rests on a support 16, of felt, so that the lubricating-pad is sufficiently pressed against the axle-journal even in the intermediate space. This arrangement makes it possible for one of the two parts of the pad-carrier to give way independently of the other in the event of any longitudinal shocks, so that there is absolutely no risk of damage to the axle-journal.

I claim—

1. The combination, with a lower plate 9, and vertical side guides 4 connected thereto; of a cross-bar 5 slidable vertically on the said



side guides, a spring interposed between the said lower plate and cross-bar, a pad-plate supported by the said cross-bar, and guide mechanism permitting the said pad-plate to  
5 slide longitudinally.

2. The combination, with a lower plate, and guides connected with it; of a cross-bar slidable vertically on the said guides, a spring interposed between the said plate and  
10 cross-bar, and means for supporting the lubricating-pad carried by the said cross-bar and free to slide in a horizontal plane.

3. The combination, with a stationary bottom plate having upwardly-projecting edges,

a lower plate 9 provided with guides which 15 are slidable longitudinally on the said edges, and vertical side guides 4 connected to the said plate 9; of a cross-bar 5 slidable vertically on the said side guides, a spring interposed between the said lower plate and 20 cross-bar, and a pad-plate supported by the said cross-bar.

In testimony whereof I affix my signature in presence of two witnesses.

GOTTFRIED MAASS.

Witnesses:

OTTO KÖNIG,

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