No. 638,925. Patented Dec. 12, 1899.

G. HÄNSLER.

CARRIAGE BRAKE.

(Application filed Dec. 13, 1898.)

(No Model.)

Fig:1.

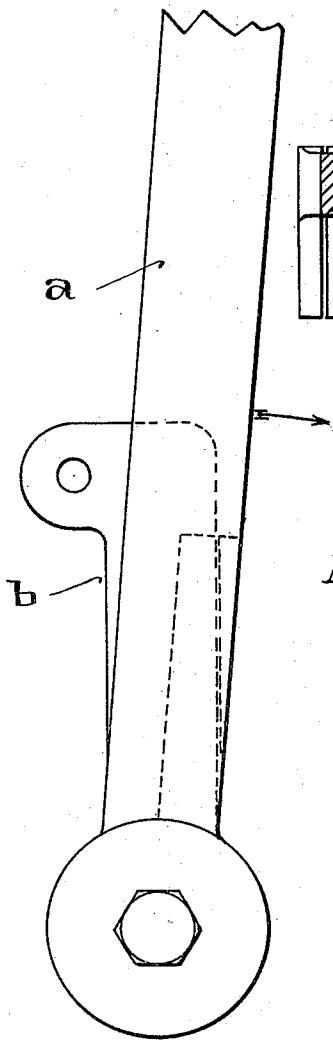


Fig:2.

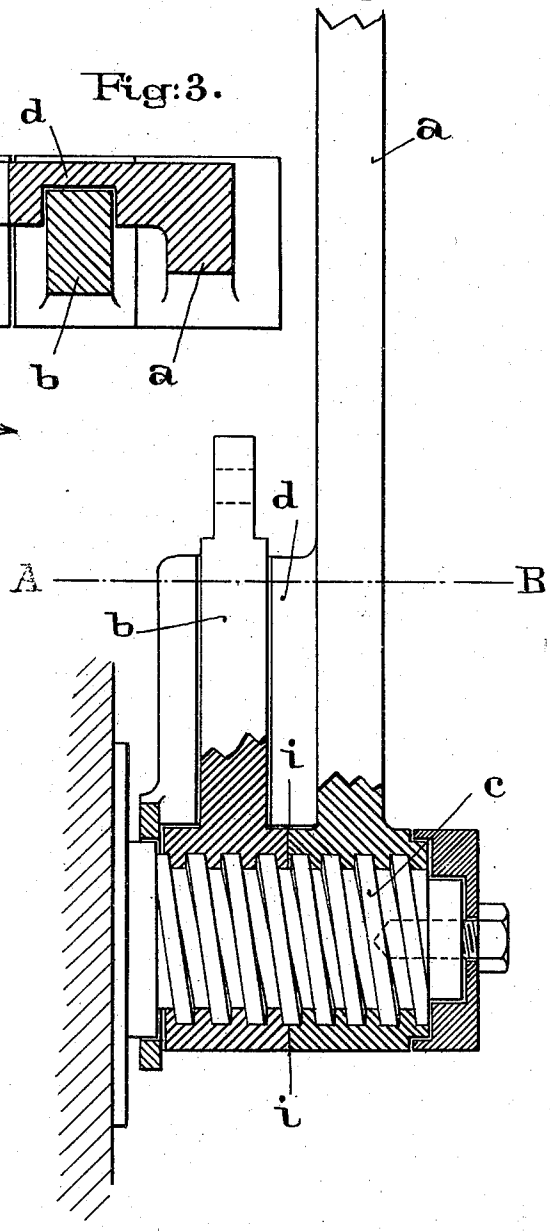


Fig:3.

Witnesses:
William Miller.
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by his attorneys
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THE NORRIS PETERS CO., PHOTO-LITHO., WASHINGTON, D. C.

UNITED STATES PATENT OFFICE.

GEORG HÄNSLER, OF MUNICH, GERMANY.

CARRIAGE-BRAKE.

SPECIFICATION forming part of Letters Patent No. 638,925, dated December 12, 1899.

Application filed December 13, 1898. Serial No. 699,114. (No model.)

To all whom it may concern:

Be it known that I, GEORG HÄNSLER, a subject of the King of Bavaria, residing at Munich, Kingdom of Bavaria, Germany, have invented certain new and useful Improvements in Carriage-Brakes, of which the following is a full, clear, and exact description.

The present invention relates to carriage-brakes; and it consists in means for avoiding the pawl-and-ratchet mechanism hitherto employed in the hand-brakes used in connection with carriages and cars.

In order to render the present specification more easily intelligible, reference is had to the accompanying drawings, in which similar letters of reference denote similar parts throughout the several views.

Figure 1 is a side elevation of the brake and hand-levers; Fig. 2, a front elevation, partly in section, of the same parts; and Fig. 3, a cross-section on the line A B of Fig. 2.

The brake-block and its operating-levers are omitted in the drawings, as these parts are well known and the invention is confined exclusively to the means for coupling the hand-lever to the lever for operating the brake-block against the wheel.

The hand-lever is indicated by *a* and is provided with a boss having an internal screw-thread and adapted to move on, or rather wedge against, the face of the boss of the brake-operating lever *b*, also internally threaded, both said levers being mounted on a screw-spindle *c*, suitably fixed to a convenient part of the carriage or car. The adjacent surfaces of the two bosses of levers *a* and *b* are indicated by *i*, and the lever *a* is provided with a lug *d*, extending behind the lever *b* and adapted to couple both levers when the hand-lever *a* is moved in the opposite direction to that indicated by the arrow in Fig. 1.

The device operates in the following manner: In order to apply the brake, the hand or power lever *a* is moved in the direction of the arrow in Fig. 1. The effect of this movement is to couple the surfaces or faces *i* by friction and to move the brake-operating lever *b* together with the lever *a* and in the same direction. As soon as the brake touches the wheel the friction between the faces at *i* will be increased in proportion to the amount of power of the brake-block against the wheel, as will be evident. When the brake is to be taken off, the lug *d* moves the brake-operating lever *b* back with the lever *a* on its (the latter's) movement in the opposite direction to that indicated by the arrow in Fig. 1.

It will thus be seen that all pawl mechanisms are avoided by the present device, the construction of which is simple and effective.

I claim as my invention—

1. In a carriage-brake the combination of a power-lever and a brake-operating lever both having internally-screw-threaded bosses and mounted on a suitable screw-spindle, so as to jam with their adjacent faces when the power-lever is moved, to apply the brake, and a lug on the said power-lever to return the brake-operating lever to its initial position when the brake is taken off substantially as described.

2. The combination of a suitably-mounted screw-threaded spindle *c*, a power-lever having internally-threaded boss to engage said spindle and a brake-operating lever *b* having also screw-threaded boss and having its face close up to that of the boss of the power-lever and means for coupling the two levers exterior of the bosses on the return stroke of the power-lever to take off the brake substantially as described.

In witness whereof I have hereunto set my hand in presence of two witnesses.

GEORG HÄNSLER.

Witnesses:
JOSEF HÄNSLER,
PAUL WÖRTH.