

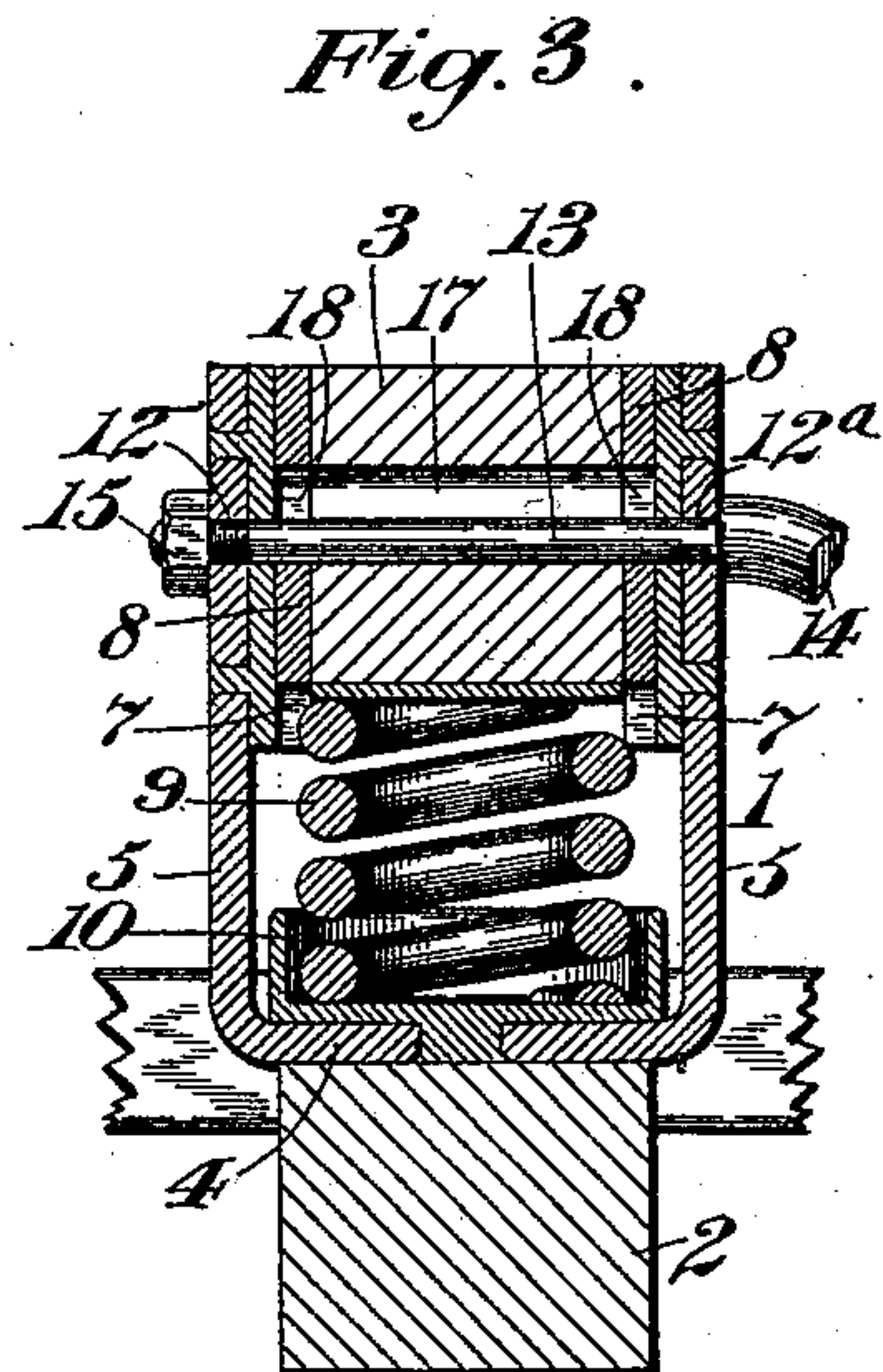
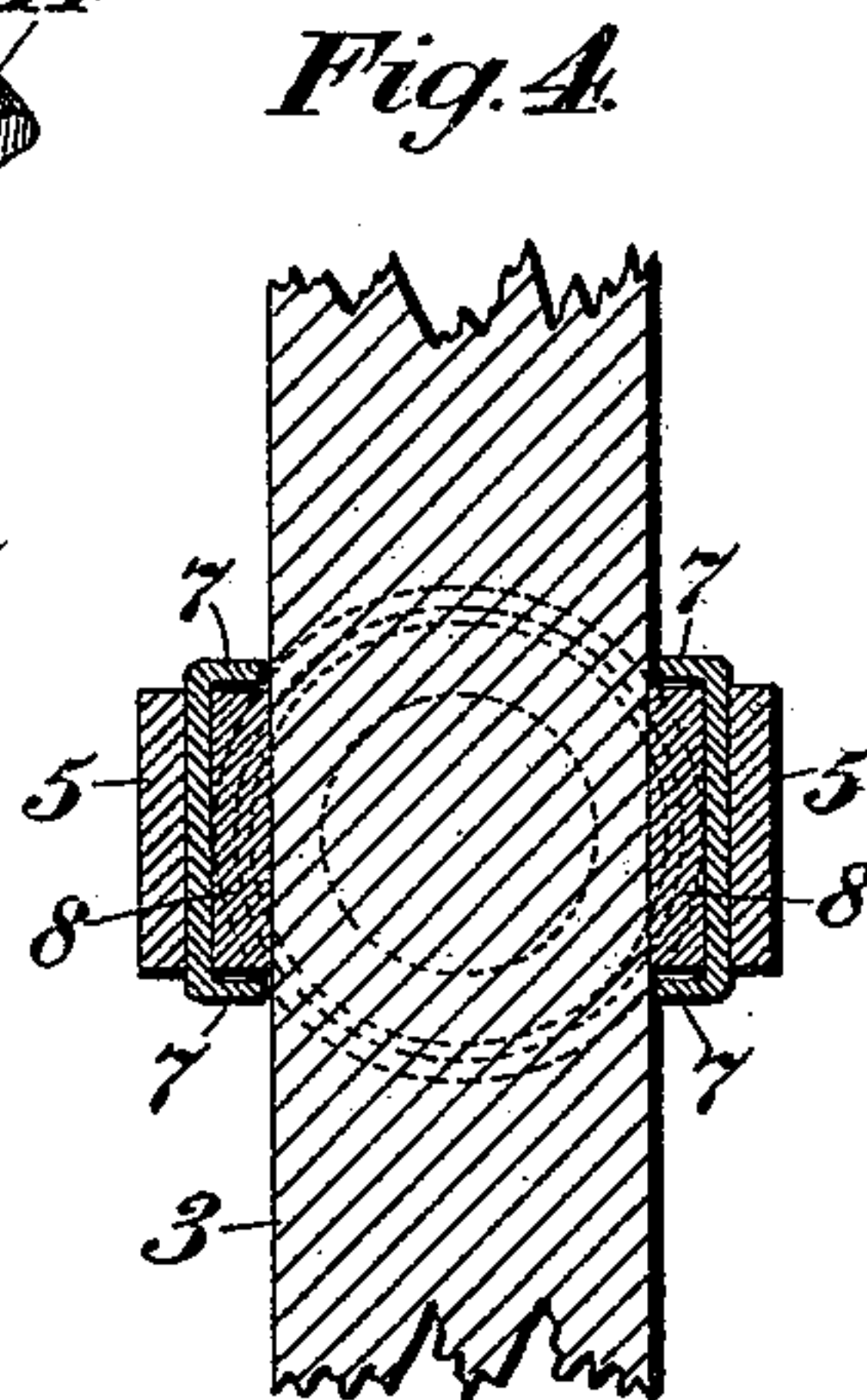
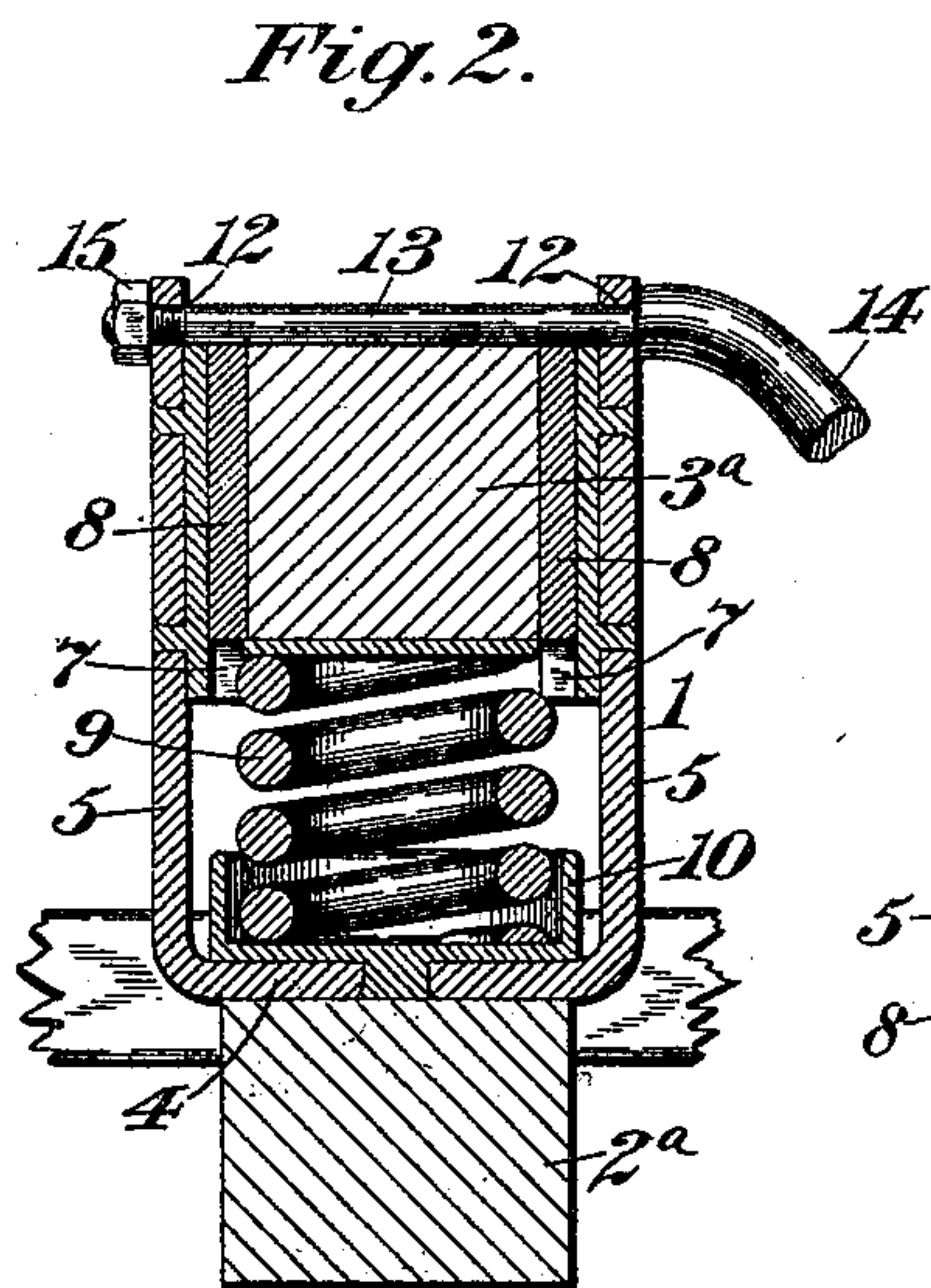
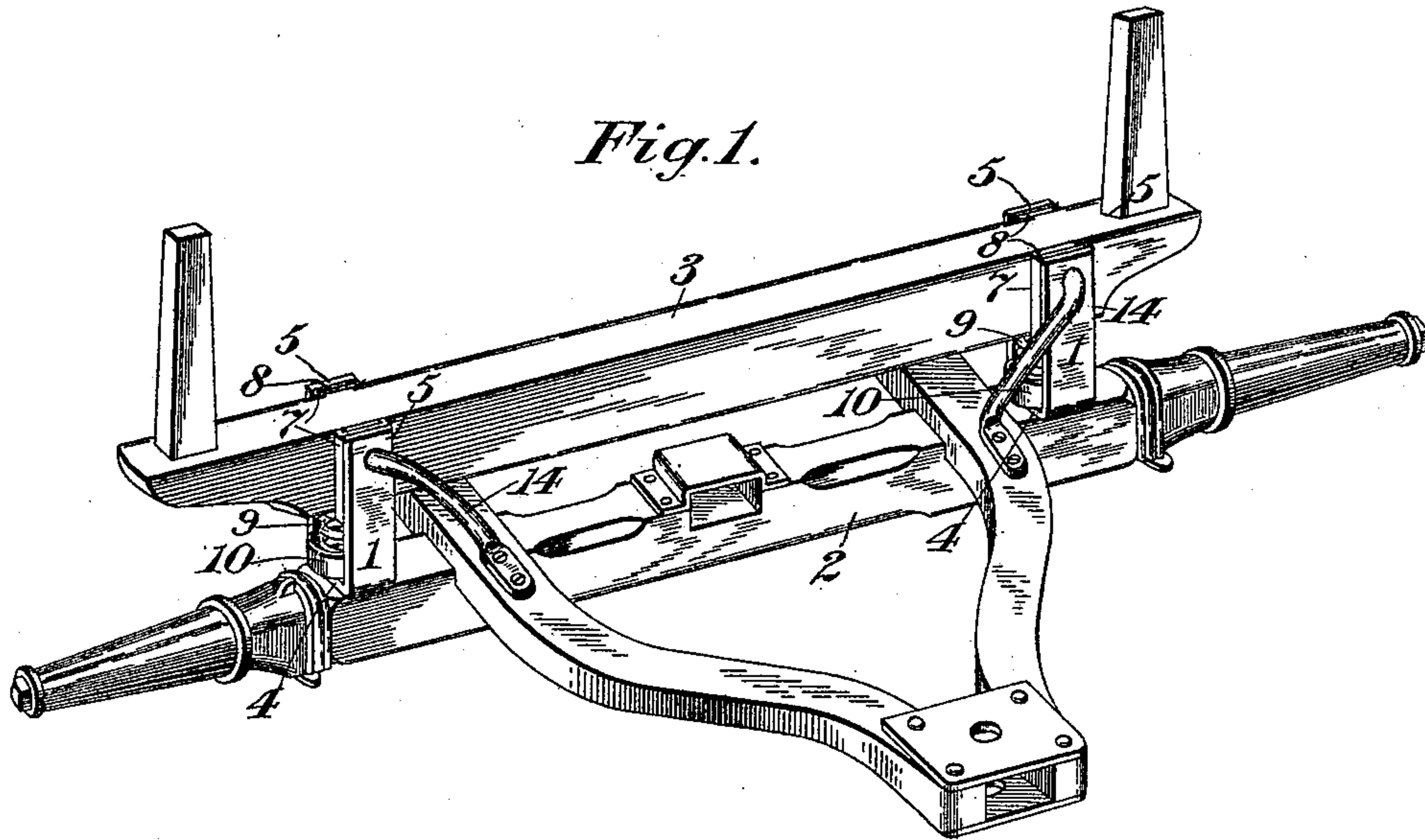
No. 631,346.

Patented Aug. 22, 1899.

D. H. TURNBULL.
RUNNING GEAR FOR WAGONS.

(Application filed Mar. 1, 1899.)

(No Model.)



Witnesses
J. L. Edwards Jr.
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UNITED STATES PATENT OFFICE.

DAVID H. TURNBULL, OF FLORENCE, ALABAMA.

RUNNING-GEAR FOR WAGONS.

SPECIFICATION forming part of Letters Patent No. 631,346, dated August 22, 1899.

Application filed March 1, 1899. Serial No. 707,261. (No model.)

To all whom it may concern:

Be it known that I, DAVID H. TURNBULL, a citizen of the United States, residing at Florence, in the county of Lauderdale and State of Alabama, have invented a new and useful Running-Gear for Wagons, of which the following is a specification.

The invention relates to improvements in running-gear for wagons.

The object of the present invention is to improve the construction of running-gear, more especially the means for yieldingly supporting bolsters and sand-boards and for guiding them in such movement and to enable the cushioning-spring and the bracket to be mounted at the same point.

The invention consists in the construction and novel combination and arrangement of parts hereinafter fully described, illustrated in the accompanying drawings, and pointed out in the claims hereto appended.

In the drawings, Figure 1 is a perspective view of a portion of a running-gear provided with a bolster-support constructed in accordance with this invention. Fig. 2 is a vertical sectional view illustrating the arrangement of the brace when the device is applied to the front axle. Fig. 3 is a vertical sectional view illustrating the arrangement of the parts when the device is applied to the rear bolster, as shown in Fig. 1. Fig. 4 is a horizontal sectional view.

Like numerals of reference designate corresponding parts in all the figures of the drawings.

1 designates a substantially rectangular bracket mounted above an axle 2 and forming a guide for a bolster 3 when applied to the rear axle 2, as illustrated in Fig. 1 of the accompanying drawings, and adapted to form a guide for a front sand-board or bolster 3^a when the device is applied to the front axle 2^a, as illustrated in Fig. 2 of the accompanying drawings. The bracket, which consists of a horizontal bottom portion 4 and vertical sides 5, is secured to the axle or the adjacent portion of the running-gear. The sides 5 of the bracket are provided with inwardly-extending flanges 7, arranged in pairs and forming ways for vertical bars 8, secured to the side faces of the bolster or sand-board and located between the sides of the bracket, as

clearly illustrated in Fig. 4 of the accompanying drawings. The vertical flanges 7, which form guides or ways, may be constructed integral with the bracket, or, as illustrated in the accompanying drawings, they may be formed by a separate plate or piece secured to the inner faces of the sides of the bracket. The vertical bars 8 of the bolster are adapted to move in the guides or ways of the bracket, and the rear bolster and the sand-board or bolster are cushioned by coiled springs 9.

The coiled spring 9, which is interposed between the bottom of the bracket and the lower face of the bolster, is seated in a cup 10, which is secured by a rivet or other suitable fastening device to the horizontal bottom portion 4, and the lower face of the bolster is provided with a wear-plate, which prevents the wood from becoming worn by the spring. The lower portions of the flanges 7 are extended below the sand-board or bolster and are arranged around the upper end of the spring to retain the same in place.

The sides of the bracket, which are extended above the front sand-board or bolster, as illustrated in Fig. 2 of the drawings, are provided with registering perforations 12, through which extends the upper portion 13 of the inclined brace 14, and the latter has its upper end or portion arranged horizontally and reduced to form a transverse bolt or rod, which is threaded at the outer end to receive a nut 15. The nut 15 engages one of the sides of the bracket and the shoulder formed by reducing the brace engages the other side of the bracket. The outer end of the brace is flattened and perforated for the reception of bolts or other suitable fastening devices for securing it to the adjacent hound or other portion of the running-gear. The braces 14 at the rear bolster extend through registering perforations 12^a, located at a point between the top and bottom of the bracket, and through the bolster, which is slotted at 17, in order to move vertically. The plates 8 of the rear bolster are also provided with slots 18, which register with the slots 17. The spring, which is shown arranged within the bracket, may be arranged at any other point on the axle.

The invention has the following advantages: The device for supporting the bol-

sters and sand-boards of vehicles is simple, inexpensive, strong, and durable, and while it guides and cushions the bolster or sand-board in its vertical movement it also protects the same from wear. The construction permits the inclined brace to be connected with the bracket either at the top or at a point below the same to adapt it for the front or rear portion of the running-gear.

Changes in the form, proportion, size, and the minor details of construction within the scope of the appended claims may be resorted to without departing from the spirit or sacrificing any of the advantages of this invention.

What is claimed is—

1. In a device of the class described, the combination with a bolster or sand-board, and a cushioning-spring, of a bracket receiving the bolster and provided with vertical sides having inwardly-extending flanges arranged in pairs at opposite sides of the bolster or sand-board, vertical bars mounted on the bolster or sand-board at the sides thereof and arranged between the said flanges, and a brace connected with the bracket, substantially as described.

2. In a device of the class described, the combination with a bolster or sand-board, and a cushioning-spring, of a bracket receiv-

ing the bolster or sand-board and provided with vertical sides having inwardly-extending vertical flanges arranged in pairs, vertical bars arranged between the said flanges and carried by the bolster or sand-board, and an inclined brace having its upper portion extended over the top of the bolster or sand-board and connecting the sides of the bracket, substantially as described.

3. In a device of the class described, the combination with a bolster or sand-board, of a bracket designed to be mounted on an axle and receiving the bolster or sand-board and provided with inwardly-extending vertical flanges arranged in pairs and depending below the sand-board or bolster, bars carried by the sand-board or bolster and arranged between the flanges, and a spring arranged between the sides of the bracket and having its upper end located within the depending portions of said flanges, whereby it is retained in position, substantially as described.

In testimony that I claim the foregoing as my own I have hereto affixed my signature in the presence of two witnesses.

DAVID H. TURNBULL.

Witnesses:

T. B. INGRAM,
E. A. MELLING.