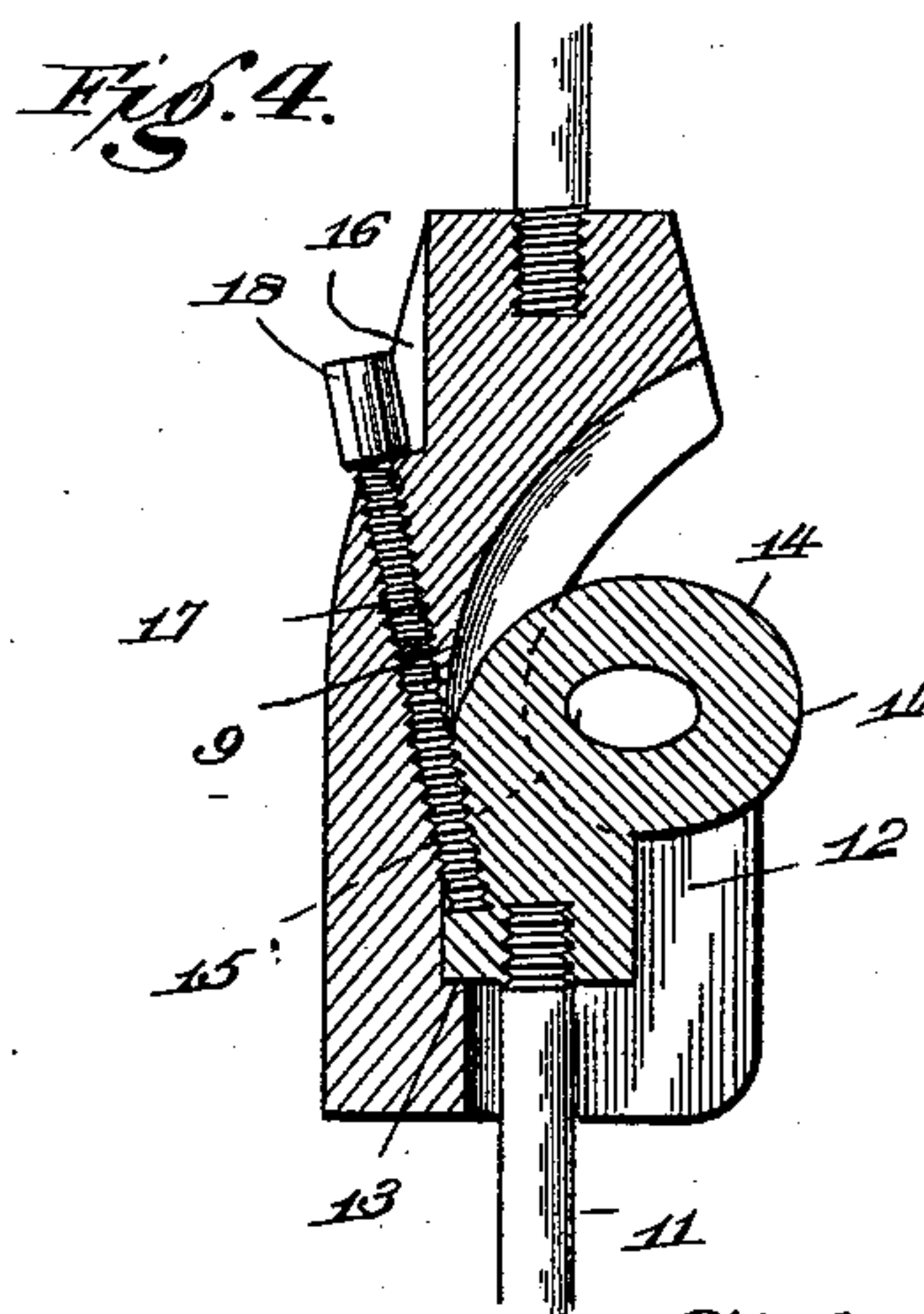
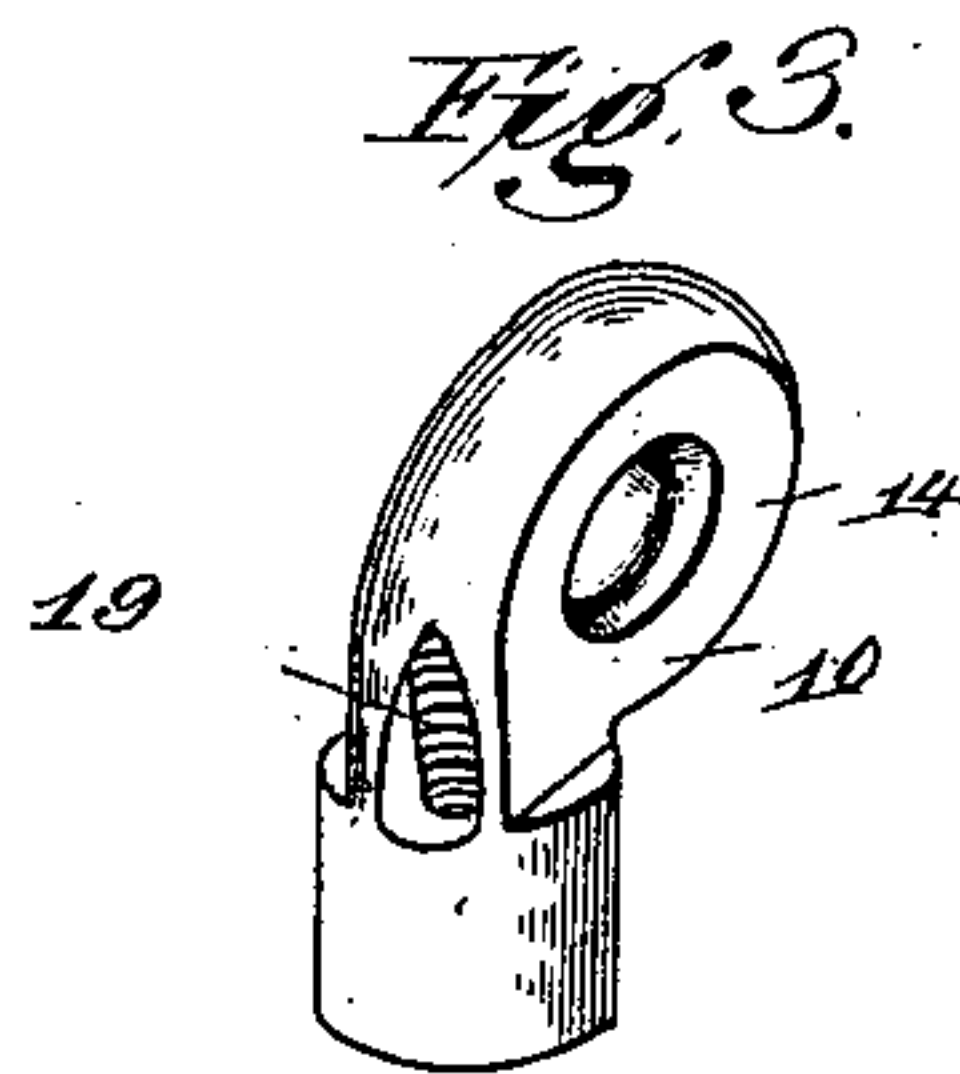
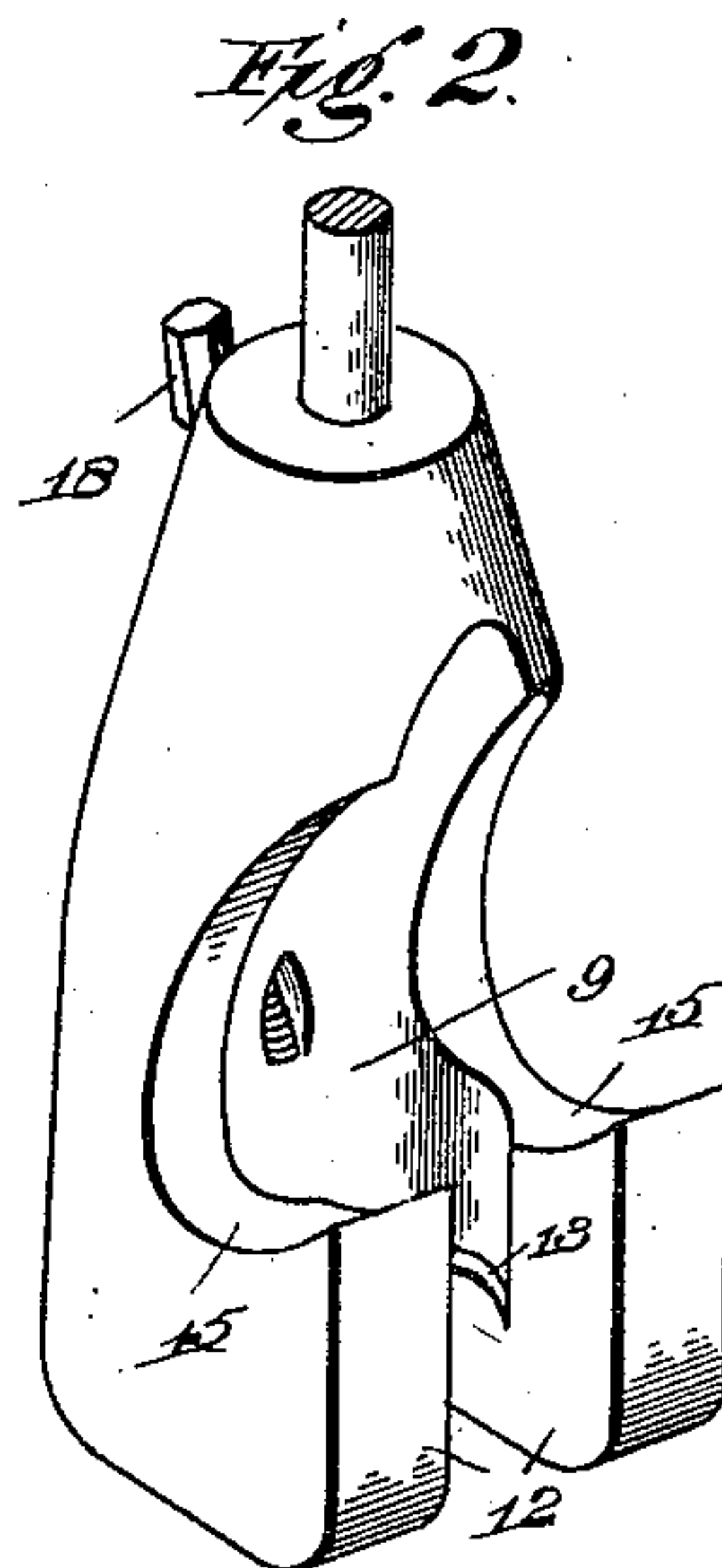
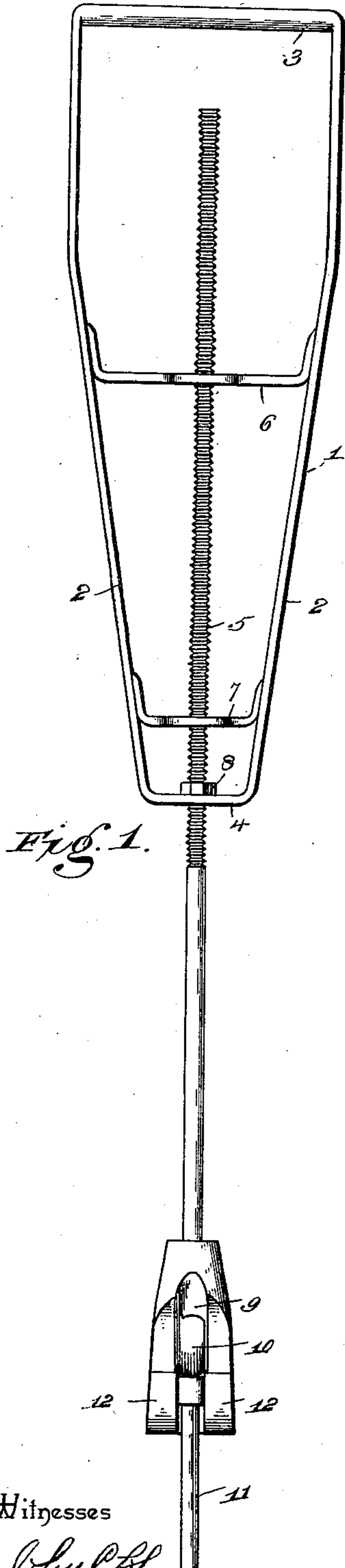


(No Model.)

S. D. PETERSON.
ADJUSTER FOR OIL WELL PUMPS.

No. 547,563.

Patented Oct. 8, 1895.



Inventor

Sidney D. Peterson,

By *W. C. S.* Attorneys.

C. A. Snow & Co.

Witnesses
John C. Shaw,
R. M. Smith.

UNITED STATES PATENT OFFICE.

SIDNEY D. PETERSON, OF TIDIOUTE, PENNSYLVANIA, ASSIGNOR OF ONE-HALF TO GEORGE B. PETERSON, OF SAME PLACE.

ADJUSTER FOR OIL-WELL PUMPS.

SPECIFICATION forming part of Letters Patent No. 547,563, dated October 8, 1895.

Application filed February 28, 1895. Serial No. 540,048. (No model.)

To all whom it may concern:

Be it known that I, SIDNEY D. PETERSON, a citizen of the United States, residing at Tidioute, in the county of Warren and State of Pennsylvania, have invented a new and useful Adjuster for Oil-Well Pumps, of which the following is a specification.

This invention relates to an improvement in devices for supporting and adjusting the polish-rod of oil or Artesian wells.

The object of this invention is to provide a new and improved form of stirrup adapted to be attached to the walking-beam and in combining therewith a vertically-adjustable coupling-head for the reception of a coupling-block on the upper end of the polish-rod, which shall be simple and inexpensive in construction, durable in practice, and effective in operation.

To this end the invention consists in the combination, with a novel form of stirrup, of a vertically-adjustable screw-threaded rod carrying at its lower end a coupling-block of peculiar construction adapted to receive and support a coupling-head on the upper end of the polish-rod; in the peculiar form of the coupling head and block, whereby the same are rendered easily separable; also in certain features and details of construction and arrangement of parts, as hereinafter fully described, illustrated in the drawings, and pointed out in the claims.

In the accompanying drawings, Figure 1 is a side elevation of the improved form of stirrup and coupling device complete, showing also a portion of the upper end of the polish-rod. Fig. 2 is a detail perspective view of the coupling or adjuster head. Fig. 3 is a similar view of the coupling-block. Fig. 4 is a vertical section through the adjuster-head and coupling-block, showing also a portion of the adjuster-rod and polish-rod.

Similar numerals of reference indicate corresponding parts in the several figures of the drawings.

Referring to the drawings, 1 designates my improved stirrup, which is closed at both top and bottom and provided with downwardly-converging side bars 2. The upper ends of the side bars 2 are connected by a cross-bar 3, which is round in cross-section, adapting it to

be supported upon and hinged to the end of a walking-beam in a manner well understood. The lower connecting-bar 4, formed integrally with the converging side bars, is provided with a central aperture, which is screw-threaded to receive a threaded adjuster-rod 5, and the stirrup may be provided with additional cross-bars 6 and 7, formed separately therefrom and riveted thereto, as indicated, said additional cross-bars being also provided with central perforations, which may or may not be screw-threaded. The bars 6 and 7 receive the adjuster-rod through their central perforations and serve to guide and steady said adjuster-rod with relation to the supporting-stirrup. By means of the screw-threaded connection between the adjuster-rod and the stirrup the former may be adjusted up and down in said stirrup and when at the desired elevation may be locked by means of a jam-nut 8.

Upon the lower end of the adjuster-rod 5 is mounted the adjuster-head, which is of peculiar form, being hollowed out centrally to form a cavity or pocket 9 for the reception of a coupling-block 10, which is threaded to or otherwise secured upon the upper end of the polish-rod 11. The cavity 9 extends downwardly through the adjuster-head and opens out at the bottom thereof, as shown, forming parallel ears or lugs 12, between which the upper end of the polish-rod is adapted to be inserted. The cavity 9 is so formed as to establish a horizontal and approximately semi-cylindrical or U-shaped shoulder 13 within and between the ears or lugs 12, against which the lower end of the cylindrical body of the coupling-head 10 is adapted to rest for supporting the polish-rod with relation to the adjuster-head.

The coupling-head 10 is provided with a suitable eye 14, through which a rope may be passed for manipulating the polish-rod for elevating it from or lowering it into the well. The parallel ears or lugs 12 on the adjuster-head are cut out, as indicated at 15, upon either side and in line with the eye 14 of the coupling-block 10 for permitting the rope referred to to be threaded through said eye 14. The adjuster-head is cut away upon its rear side, as shown at 16, and an inclined perforation 17, extending therefrom through the

rear wall of the adjuster-head, is provided for the reception of a screw-threaded pin 18, the lower end of which is adapted to enter and engage a threaded socket 19 in the coupling-head 10 of the polish-rod. When the pin 18 is in engagement with the head 10 it will be impossible for the latter to escape from the adjuster-head. By withdrawing the pin 18 from engagement with the head 10 the latter may be elevated sufficiently, so that it can be withdrawn from the adjuster-head, thereby uncoupling the polish-rod and enabling the same, together with the sucker-rods, to be withdrawn from the well.

From the foregoing description it will be apparent that my improved coupling and adjusting device is very simple and durable, capable of being quickly and easily manipulated, and that it has a great advantage over previous constructions for the same purpose, as by means of the manner of coupling above described the necessity for clamping the polish-rod between a pair of jaws is dispensed with, and the surface of said polish-rod is kept smooth, so that it may be passed through the packing without injuring the latter and rendering a leakage therein. It will also be apparent that the adjuster-head and coupling-block on the upper end of the polish-rod may be instantly uncoupled and again coupled, thus saving considerable time in such operation.

Various changes in the form, proportion, and the minor details of construction may be resorted to without departing from the principle or sacrificing any of the advantages of this invention.

Having thus described my invention, I claim—

1. In an adjusting mechanism for the polish rod of oil or Artesian wells, a stirrup having its lower end closed and provided with a screw threaded central perforation for the reception of and in combination with a threaded adjuster rod, an adjuster head mounted on the lower end of said rod, and provided with a socket for the reception of a coupling head on the upper end of the polish rod, substantially as described.

2. In an adjuster for oil well pumps, a stir-

rup adapted to be connected at its upper end to a walking beam and provided at its lower end with an integrally formed cross bar provided with a central threaded perforation for the reception of and in combination with a screw threaded adjuster rod, an adjuster head mounted thereon and provided with a shouldered cavity, a coupling block adapted to be seated therein, and the polish rod secured to said coupling block, substantially as and for the purpose described.

3. A combined polish rod support and adjuster comprising a stirrup, a vertically movable adjuster rod, and an adjuster head mounted on said rod, a central cavity 9, and a lateral opening in said head leading to said cavity and a horizontal shoulder 13, in combination with a polish rod, and a coupling block thereon adapted to rest within said pocket and be supported upon said shoulder, substantially as described.

4. A combined polish rod support and adjuster comprising a stirrup, a vertically movable adjuster rod, and adjuster head mounted on said rod and provided with a shouldered cavity for the reception of and in combination with a coupling block, a polish rod secured thereto, and a threaded pin carried by the adjuster head, and adapted to engage a threaded socket in said coupling block for locking the latter in place, substantially as described.

5. In a combined polish rod adjuster and support, the combination with the supporting stirrup, and the adjuster rod movable vertically therein, of an adjuster head provided with a central cavity or seat, the parallel ears or lugs provided with concavities or cut out portions 15, and a coupling block attached to the upper end of the polish rod and provided with an eye in line with the concavities 15 for the purpose substantially as specified.

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

SIDNEY D. PETERSON.

Witnesses:

L. C. PORTERFIELD,
W. F. MOORE.