

No. 638,938.

Patented Dec. 12, 1899.

P. H. REARDON.
ATTACHMENT FOR ROCK DRILLS.

(Application filed July 21, 1897.)

(No Model.)

Fig. 1.

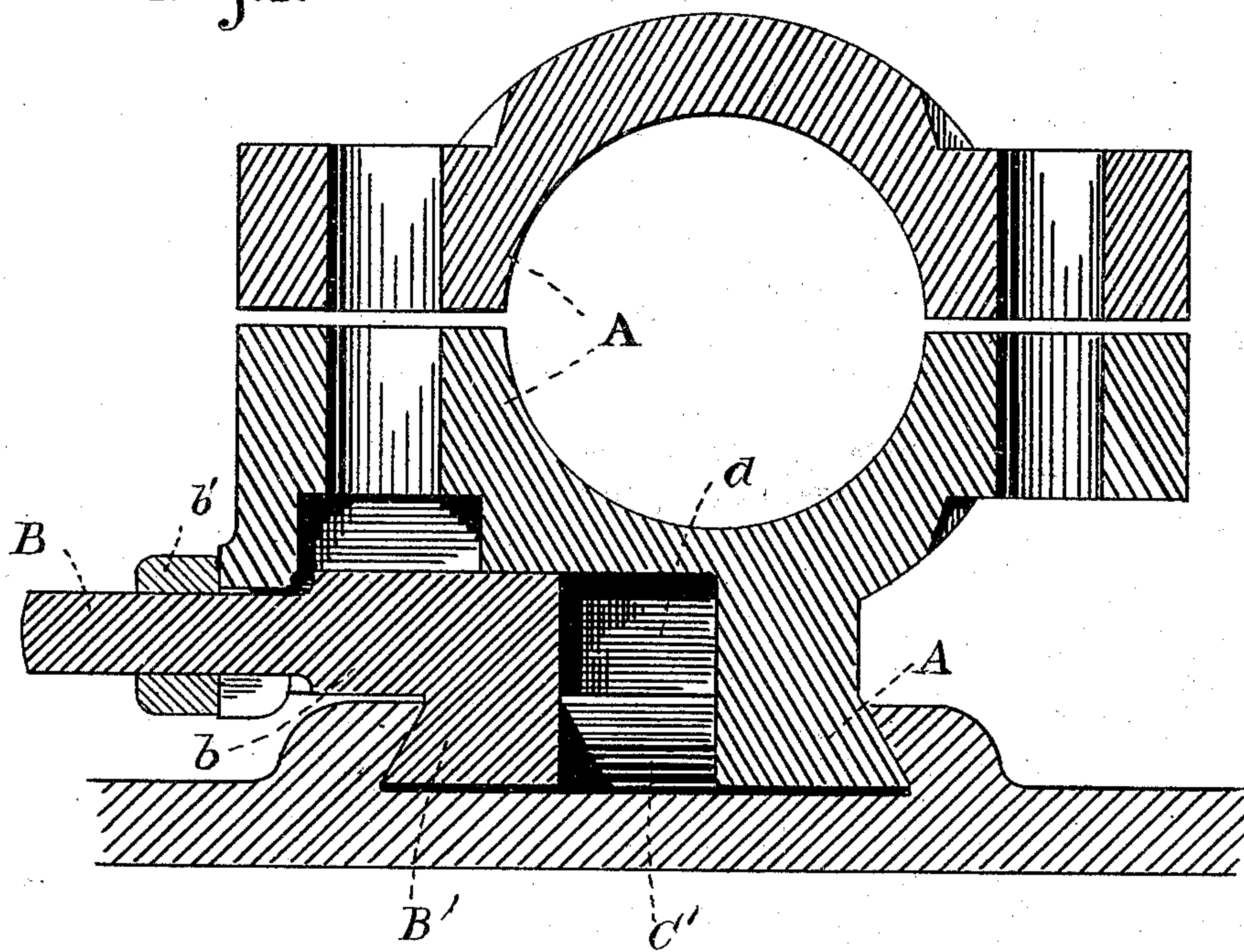
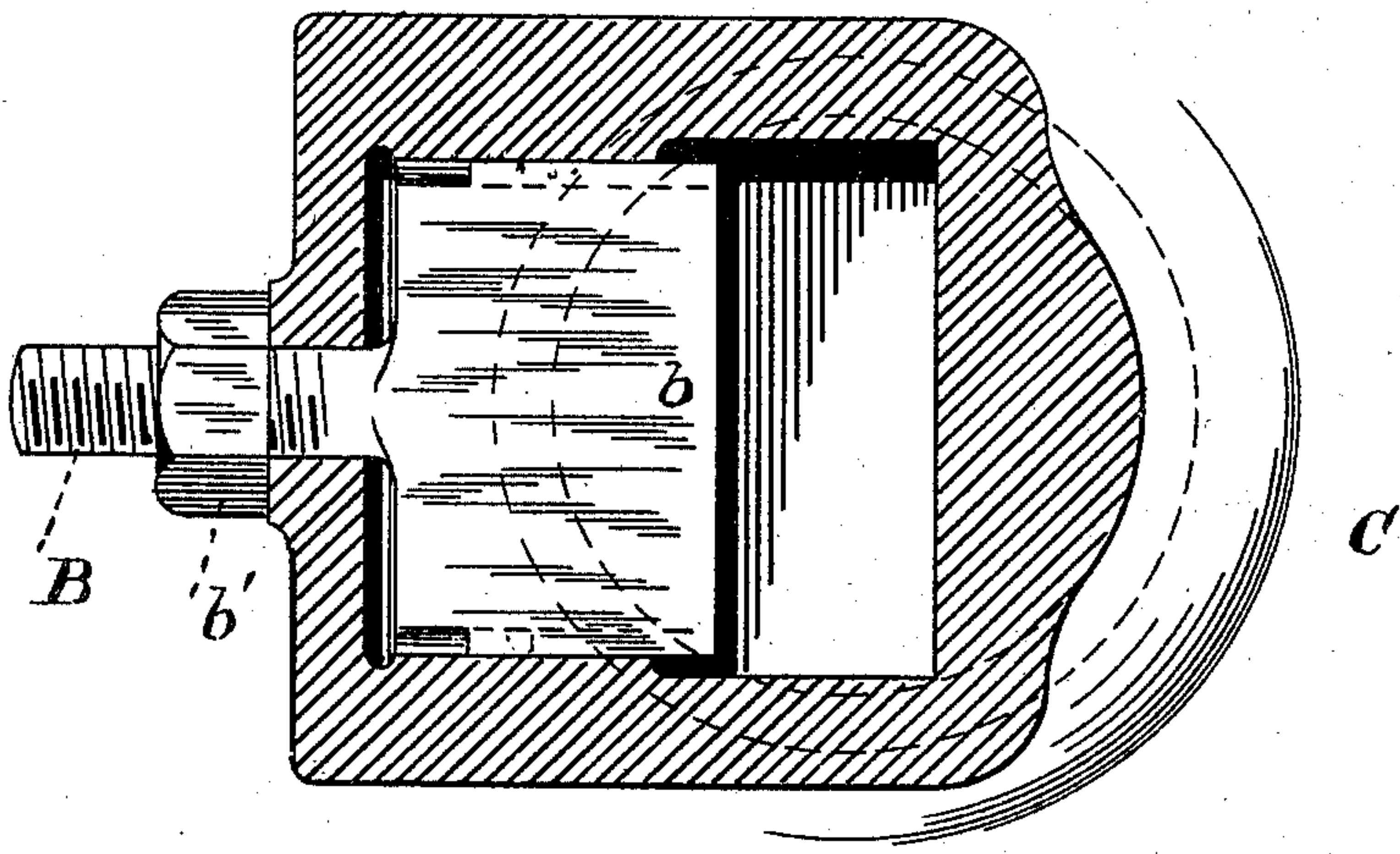


Fig. 2.



Witnesses:
Wm. F. Watson.
L. B. Cooper.

Inventor.
Patrick H. Reardon
By W. H. Smyth
att'y

UNITED STATES PATENT OFFICE.

PATRICK H. REARDON, OF SAN FRANCISCO, CALIFORNIA.

ATTACHMENT FOR ROCK-DRILLS.

SPECIFICATION forming part of Letters Patent No. 638,938, dated December 12, 1899.

Application filed July 21, 1897. Serial No. 645,440. (No model.)

To all whom it may concern:

Be it known that I, PATRICK H. REARDON, a citizen of the United States, residing in the city and county of San Francisco, in the State of California, have invented an Improved Attachment for Rock-Drills, of which the following is a specification.

This invention relates to the class of devices for attaching a rock-drill to its column or bar.

The object of the invention is to provide a simple, cheap, and efficient device for this purpose whereby the labor of handling and operating the drill is facilitated and economized. I attain this object by means of the device illustrated in the accompanying drawings, in which—

Figure 1 is a plan, portions being in section. Fig. 2 is an elevation sectioned through $x x$ of Fig. 1.

Referring to the drawings, A is a split clamp adapted to embrace a suitable column or bar. Projecting from one of the clamp members is a lug A' of arc shape on one side, which is also beveled or dovetail in section, as shown in Fig. 1. The other side of this lug is defined by the chord of the arc. This latter side forms one end of a rectangular groove or pocket a , in which is located a bolt B, having a wide flat head b , adapted to slide in and be guided by the parallel sides of pocket a . The bolt B passes through one end of pocket a and is provided with a suitable nut b' . Raised upon the outer surface of the flat head b is a lug B' similar to A', and when in position these two lugs form a circular dovetail projection having a parallel space intermediate of the adjacent sides.

C is a shell or slide-feed frame of a rock-drill. It is provided with a circular recess or pocket C', the inner circular surfaces of which are shaped to correspond with the sloping sides of the lugs A' B', the inner diameter being larger than the outer or entrance.

The bolt-head b is fitted into suitable close-fitting guides in the pocket a . The head b may be made separate from the bolt proper and a socket provided, whereby the bolt and sliding block may be engaged.

The operation of the device is as follows: The clamp being secured upon the column and the nut b' unscrewed, thus permitting

the bolt, with its projective lug B', to approach lug A', the drill, of which shell C is part, can now be hung loosely upon the lugs A' B' by inserting them (which their position permits of) into the pocket or recess C'. Screwing up the nut b' forces the lugs B' and A' apart, thus forcing them against the undercut sloping walls of the circular pocket C' and securing the shell and its attached drill in any desired position.

By the construction described two men only instead of three, as is customary, are necessary to handle the drill, for it is not necessary to support the weight of the drill when hooked upon lugs A' B' even before the lug B' is tightened into place.

Having now described my invention, what I claim as new, and desire to secure by Letters Patent, is—

1. In a rock-drill attachment, a shell provided with a pocket of two diameters, in combination with a column-clamp having a lug adapted to enter said pocket after the clamp is secured upon the column and a device opposable to the lug whereby it is secured in said pocket.

2. In a rock-drill attachment a clamp provided with means adapted to secure it upon a column, opposable projections thereon adjustable with reference to each other and to the clamp, in combination with a drill-shell having a pocket of two diameters adapted to receive said projections after the clamp has been secured upon its column.

3. In a rock-drill attachment a feed-frame provided with a circular pocket of two diameters in combination with a column-clamp having a lug adapted to enter and engage with said pocket and means, independent of those for securing the clamp to the column for locking said lug securely therein.

4. In a rock-drill attachment a shell provided with a circular pocket of two diameters in combination with a clamp having a beveled lug adapted to enter and engage with said pocket and a bolt having a hooking-head adapted to enter and engage with the pocket whereby said clamp is securely attached to the shell.

5. A rock-drill-column clamp having a projecting lug A' a device sliding in said clamp and a lug B' substantially similar to A' a suit-

able device adapted to engage with A' and B' whereby the drill may hang loosely thereon and means for operating the lugs whereby the drill is securely attached.

- 5 6. In a rock-drill attachment, a feed-frame provided with a circular pocket, of two diameters, in combination with a column-clamp having a device adapted to enter said pocket,

and means independent of those for securing the clamp to the column for locking said device securely in said pocket. 10

PATRICK H. REARDON.

Witnesses:

WM. A. HEWITT,
W. A. MCKOWEN.