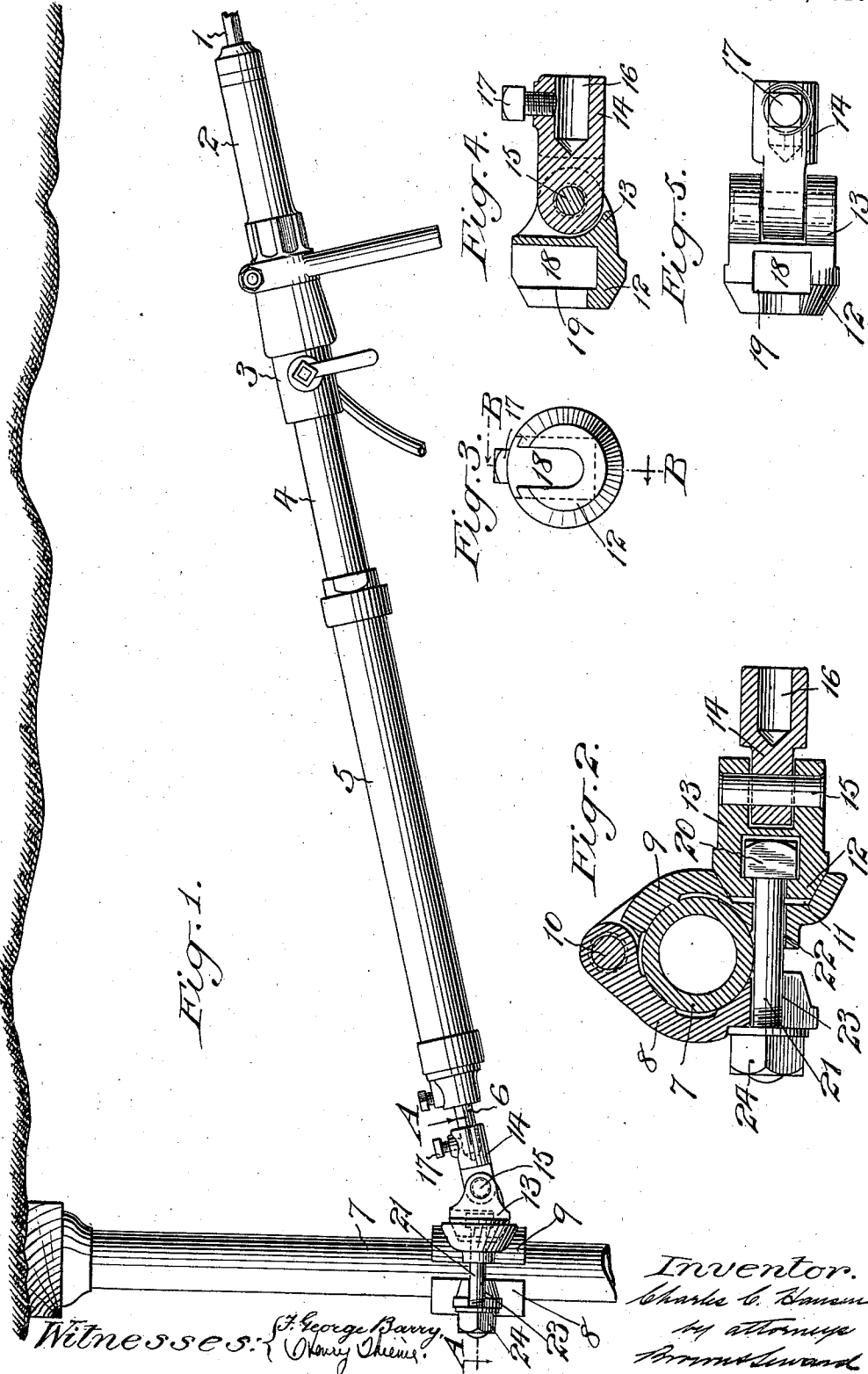


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MOUNTING FOR DRILLS.
APPLICATION FILED SEPT. 2, 1908.

977,734.

Patented Dec. 6, 1910.



Witnesses: { F. George Barry
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UNITED STATES PATENT OFFICE.

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MOUNTING FOR DRILLS.

977,734.

Specification of Letters Patent.

Patented Dec. 6, 1910.

Application filed September 2, 1908. Serial No. 451,443.

To all whom it may concern:

Be it known that I, CHARLES C. HANSEN, a citizen of the United States, and resident of Easton, in the county of Northampton and State of Pennsylvania, have invented a new and useful Improvement in Mountings for Drills, of which the following is a specification.

The object of this invention is to provide certain improvements in the construction, form and arrangement of the several parts of a mounting for drills, especially adapted for hammer drills, whereby the drill may be supported at its rear end in any desired angular position with respect to its support, by a very simple device.

A practical embodiment of the invention is represented in the accompanying drawings in which—

Figure 1 represents a hammer drill, a support therefor and my improved mounting, the parts being in the position ready for use. Fig. 2 is an enlarged detail cross section through the mounting taken in the plane of the line A—A of Fig. 1, looking in the direction of the arrows, with the hammer drill removed. Fig. 3 is an end view of the rotatably adjustable base and the tail pointer receiving socket which is hinged thereto, Fig. 4 is a section taken in the plane of the line B—B of Fig. 3, looking in the direction of the arrows, and Fig. 5 is a plan view of the same.

The pneumatic tool herein shown in connection with my improved mounting is an air feed hammer drill, the drill steel being denoted by 1, the cylinder by 2, the head block by 3, the air feed piston by 4, the air feed cylinder by 5 and the tail pointer by 6. A suitable support is provided for the rear end of the hammer drill, which support is herein represented as a vertical column 7. A support clamp is fitted to embrace the column 7, which clamp comprises members 8 and 9 hinged together at 10. The member 9 is provided with a recess 11 for the reception of the cone 12 of a rotatably adjustable base 13. A tail pointer receiving socket piece 14 is hinged at 15 to the base 13 so as to be swung at any desired angle with respect thereto. The socket of this socket piece is denoted by 16 and it is fitted to receive the tail pointer 6 of the hammer drill. A set screw 17 is provided

for clamping the tail pointer within the socket 16.

The rotatably adjustable base 13 is provided with an elongated socket 18 having shoulders 19 arranged to engage the head 20 of a bolt, the shank 21 of which is arranged to pass through a hole 22 through the free member 9 of the support clamp arranged centrally with respect to the recess 11 and also through an open-sided hole 23 in the free end of the support clamp member 8. The screw-threaded end of this bolt is provided with a nut 24 arranged, when tightened, to draw the cone 12 of the base snugly into engagement with the walls of the recess 11 in the support clamp member 9 and also to draw the two members 8 and 9 of the support clamp into snug engagement with the column 7. By loosening the nut 24, the support clamp may be turned into any desired rotary position with respect to the column 7 and the base 13 which carries the socket piece 14, may be turned into any rotary position with respect to the support clamp. When the parts have been adjusted into the desired positions, the tightening of the nut 24 will serve to clamp the parts securely in such positions. The hammer drill may be removed from the socket piece 14 by loosening the set screw 17. The base 13 may be removed from the support clamp by loosening the nut 24 sufficiently to permit the removal of the cone 12 from the recess 11.

It will be seen from the above description that a very simple device is provided permitting the adjustment of the hammer drill into any desired position with respect to its support and also for providing an end support for said hammer drill in such desired position. Furthermore, it will be seen that the mounting for the drill may be adjusted very easily and quickly into any other position when so desired.

While I have shown and described this invention in connection with an air feed hammer drill, it is to be understood that the mounting may be used in connection with other kinds of tools whenever it is feasible to do so.

What I claim is:

1. In a mounting for drills, a suitable support, a clamp engaging the support, a base, a socket piece hinged to the base and

arranged to receive and support the rear end of the drill and a bolt for securing the base to the support clamp and the support clamp to the support.

5 2. In a mounting for drills, a suitable support, a clamp engaging the support, a base rotatably mounted on the support clamp, a socket piece hinged to the base and arranged to receive and support the rear end of the
10 drill and a single means for securing the base to the support clamp and the support clamp to the support in the desired adjustments.

3. In a mounting for drills, a suitable
15 support, a clamp engaging the support, a base rotatably mounted on the support clamp, a socket piece hinged to the base and arranged to receive and support the rear end of the drill and a bolt for securing the base
20 to the support clamp and the support clamp to the support in the desired adjustments.

4. In a mounting for drills, a suitable support, a clamp engaging the support comprising members hinged together one of said
25 members having a recess, a base having a

cone fitted to said recess, a socket piece hinged to the base and arranged to receive and support the rear end of the drill and a single means for securing the cone within the recess and the support clamp to the support in the desired adjustments.

5. In a mounting for drills, a suitable support, a clamp engaging the support comprising members hinged together one of said members having a recess, a base having
35 a cone fitted to said recess, a socket piece hinged to the base and arranged to receive and support the rear end of the drill and a bolt for securing the cone within the recess and the support clamp to the support in the
40 desired adjustments.

In testimony, that I claim the foregoing as my invention, I have signed my name in presence of two witnesses, this twenty-ninth day of August 1908.

CHARLES C. HANSEN.

Witnesses:

ARTHUR J. SHIMER,
HERBERT S. YOUNG.