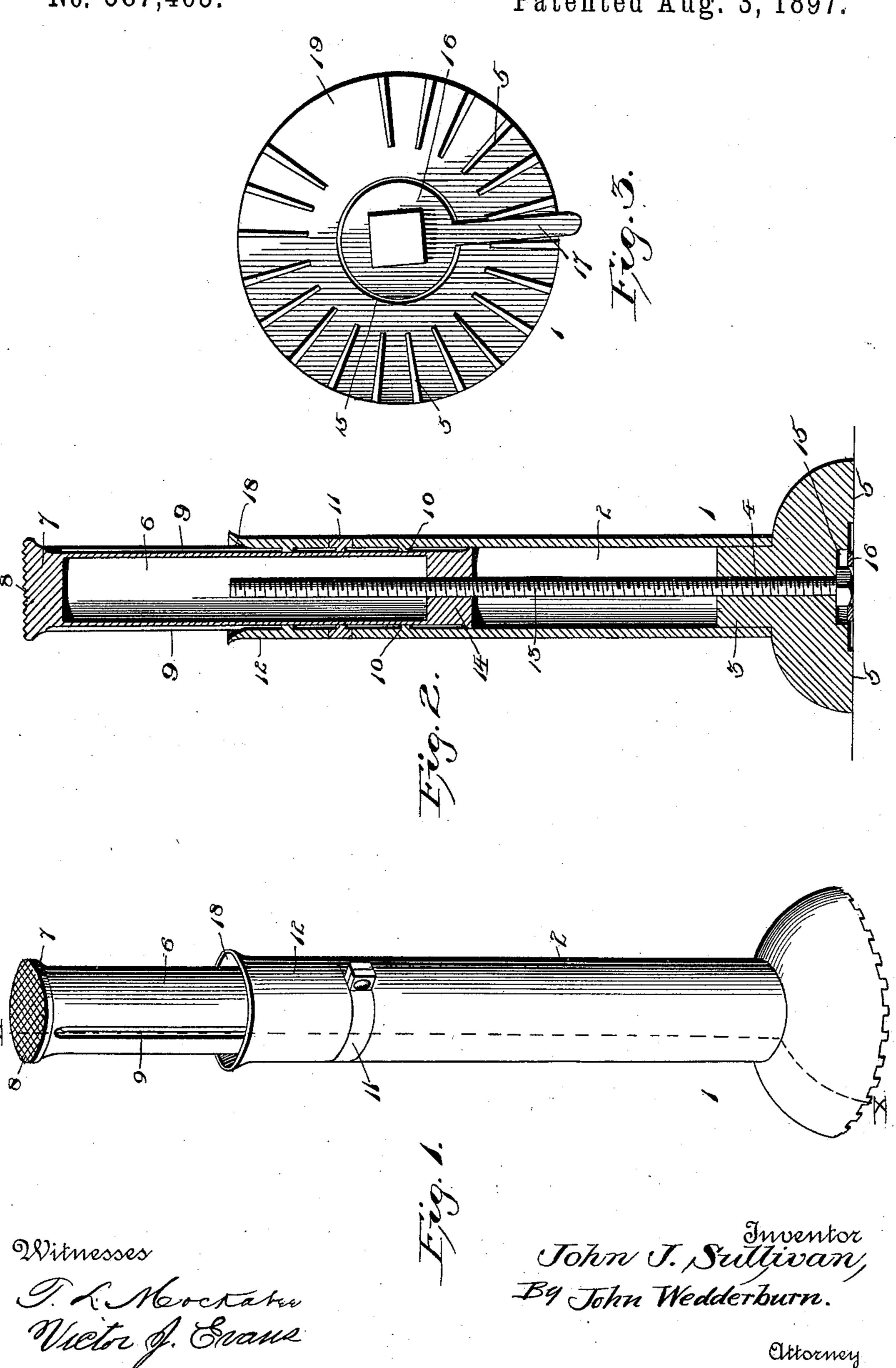
(No Model.)

J. J. SULLIVAN. EXTENSION MINING POST.

No. 587,463.

Patented Aug. 3, 1897.



United States Patent Office.

JOHN J. SULLIVAN, OF RED JACKET, MICHIGAN.

EXTENSION MINING-POST.

SPECIFICATION forming part of Letters Patent No. 587,463, dated August 3, 1897.

Application filed April 20, 1897. Serial No. 632,929. (No model.)

To all whom it may concern:

Be it known that I, John J. Sullivan, a citizen of the United States, residing at Red Jacket, in the county of Houghton and State of Michigan, have invented certain new and useful Improvements in Extension Mining-Posts; and I do hereby declare the following to be a full, clear, and exact description of the invention, such as will enable others skilled in the art to which it appertains to make and use the same.

This invention relates to extension mining-posts; and it consists, essentially, of a supporting member having an adjustable section mounted therein, together with the details of construction and arrangement, which will be more fully hereinafter described and claimed.

The object of the present invention is to provide a post which is especially adapted 20 for use in mines to support operating mechanism, such as drills and other devices, at varying elevations, the parts being simple and effective in their construction and operation, strong and durable, and comparatively inexpensive in the cost of manufacture.

In the accompanying drawings, Figure 1 is a perspective view of the improved post. Fig. 2 is a section on the line x x of Fig. 1. Fig. 3 is a bottom plan view of the post.

Referring to the accompanying drawings, wherein similar numerals of reference are employed to indicate corresponding parts in the several views, the numeral 1 designates a base of sufficient lateral extent to provide 35 a stable support and having rising therefrom a hollow standard 2. Inside of the standard and resting on or forming part of the said base is a bearing 3, having a vertically-disposed screw-threaded opening 4, ex-40 tending therethrough and alining with an opening in the base 1, the latter being constructed with radially-arranged lugs 5, extending inwardly a suitable distance from the periphery of said base for a purpose which 45 will be presently referred to. Adjustably fitted in the hollowstandard 2 is a section 6, having a head 7, with an upper roughened or serrated surface 8 to bite into a wall or support either of the material being mined or a 50 part of the mine-framing. The said section 6 is also formed with oppositely-situated grooves 9, which are engaged by inwardly-extending

tongues 10 on the interior of the standard 2 to hold the said section 6 against rotation and at the same time permit a ready vertical ad- 55 justment. Over the top of the standard 2 is mounted an adjustable collar 11, also provided with tongues, and above the said collar is a sleeve 12, having tongues extending inwardly therefrom, engaging the grooves 9, 60 and to which the mining machinery or device is adapted to be attached, the said sleeve being held in proper position above the standard 2 by the collar 11. Within the standard 2 and extending upwardly therefrom is a 65 screw 13, which also passes through a bearing 14 in the lower end of the section 6, and by means of said screw the said section 6 is adjusted vertically and prevented from turning in its adjustment by its grooves 9 engag- 70 ing the tongues in the sleeve 12, collar 11, and the upper part of the standard 2. The head of the screw 13 is located in the central portion of the base, a recess 15 being provided at this point to receive said head in such 75 manner as to avoid exterior projection or extension of any part thereof beyond the horizontal resting plane of said base. The head of the said screw is angular and is adapted to be operated by a box-wrench, and after an ad-80 justment has been attained a slotted key 16 is mounted thereover and has an arm 17 projecting therefrom, which is placed between two of the radial lugs 5 to hold the screw stationary after an adjustment thereof has been 85 secured.

The parts of the device as an entirety are easily assembled and disconnected, and by removing the collar 8, which also supports the screw, the other devices may be readily 90 separated. The section 6 is hollow throughout the greater portion of its length, and the head 7 is solid, to provide a rigid resistance at this point against fracture by a pressure exerted thereon. The upper part of the sleeve 95 12 is also flanged at its upper end, as at 18, and the head can rest thereon when sufficiently lowered as an additional reinforcement, and between a portion of the radial lugs 5 on the base 1 an opening 19 is provided, which may 100 be made large enough to insert a wrench therethrough to engage the head of the screw 13, or the projecting end of the arm 17 of the key can be used for this purpose and afterward secured by two of said lugs, as indicated. The collar 11 prevents the sleeve 12 from moving downwardly when the mechanism is attached thereto, and when the sleeve is adjusted vertically the collar is also moved and forms a rest therefor.

The simplicity, efficiency, and cheapness of the herein-described construction will be apparent to any one skilled in the art, and it is also obviously apparent that many minor changes in the details of construction and arrangement might be made and substituted for those shown and described without in the least departing from the nature or spirit of the invention.

Having thus described the invention, what is claimed as new is—

In a mining-post, the combination of a standard having a base with a series of radial local lugs thereon and a central recess, a movable

section mounted in the said standard and having grooves in the opposite side of the same, a sleeve on the said movable section, a collar surrounding the upper part of the standard, said standard, collar and sleeve having in-25 wardly-extending tongues to engage the opposite grooves of the said movable section, a screw extending upwardly through the base of the standard into the movable section, and a key having an arm and adapted to be fitted 30 over the head of the screw and lock the same against movement, substantially as and for the purposes specified.

In testimony whereof I have signed this specification in the presence of two subscrib- 35

ing witnesses.

JOHN J. SULLIVAN.

Witnesses:
DENNIS SULLIVAN,
BERT TAYLOR.