(No Model.)

J. H. VAN DORN.

WROUGHT METAL JOIST HANGER.

No. 537,504. Patented Apr. 16, 1895.

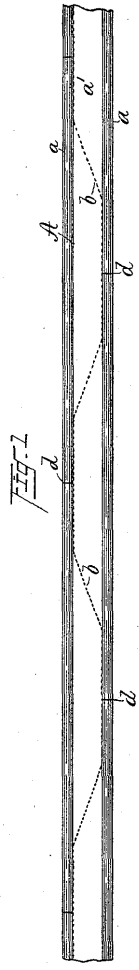

Fig. 1.

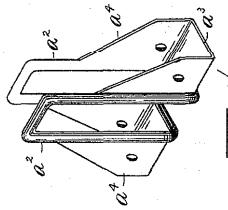

Fig. 6.

Fig. 2.

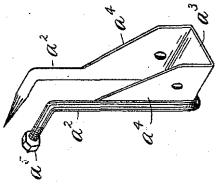

Fig. 4.

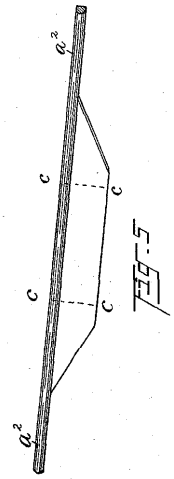

Fig. 5.

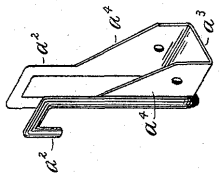

Fig. 3.

Witnesses
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Helen M. Wood.

Inventor.
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By Ubing & Thurston
his attys

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UNITED STATES PATENT OFFICE.

JAMES H. VAN DORN, OF CLEVELAND, OHIO.

WROUGHT-METAL JOIST-HANGER.

SPECIFICATION forming part of Letters Patent No. 537,504, dated April 16, 1895.

Application filed August 31, 1894. Serial No. 521,794. (No model.)

To all whom it may concern:

Be it known that I, JAMES H. VAN DORN, a citizen of the United States, residing at Cleveland, in the county of Cuyahoga and State of Ohio, have invented certain new and useful Improvements in Wrought-Metal Joist-Hangers; 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.

My invention relates to wrought metal joist hangers; and the object of the invention is to produce a wrought metal joist hanger which shall be sufficiently strong for the intended use, and which shall be cheaper than the wrought metal joist hangers which have been made heretofore.

The invention consists in the described hanger and the blank from which it is made, substantially as hereinafter described and claimed.

In the drawings Figure 1 is a plan view of a wrought iron bar from which the blanks are cut, and it shows the manner of cutting said bar to produce the blanks with no considerable waste of material. Fig. 2 is an end view of said bar. Fig. 3 is a perspective view of a completed hanger. Fig. 4 is a perspective view of another hanger of slightly modified form. Fig. 5 is a perspective view of the blank from which said hangers are formed; and Fig. 6 is a perspective view of a double hanger.

In the manufacture of the described hanger I employ a wrought iron bar A having on both edges of the web a' a thickened strengthening rib a,—which bar may be rolled into the described form. The sections forming the hanger blanks are alternately cut from opposite sides of this bar; and as shown in Fig. 1 this is done by cutting the web of the bar diagonally in opposite directions on the lines b b, and cutting off the rib on the short side of the sections thus formed, leaving said rib connected to and projecting from the ends of the adjacent sections. The said ribs are then cut transversely on the lines d d to separate the hanger blanks;—all of which is shown in Fig. 1. Each of the blanks thus formed has unequal parallel sides and oppositely inclined ends, and it has a thickened strengthening rib a on the long side,—which rib projects beyond both ends thereof forming the arms a^2 a^2, as shown in Fig. 5. The hangers are formed from said blanks by bending them on the lines c c, thereby forming a horizontal shelf a^3, and two parallel vertical sides a^4 a^4. The joist to be supported by said hanger lies between said sides a^4 a^4 and rests upon said shelf a^3. The arms a^2 a^2 are bent backward at the points where they join the body of the blank, as shown in Figs. 3, 4 and 5, and these arms afford the means for connecting the hanger to a beam or to a wall. The ends of these arms may be sharpened and driven in. They may be screw threaded and pass through the beam and be held by a nut a^5, both of which constructions are shown in Fig. 4. The arms a^2 a^2 may be bent into hook form, as shown in Fig. 3, whereby they are adapted to hang from the top of a beam. A double hanger, as shown in Fig. 6, may be formed by not cutting the rib which connects two hanger blanks.

Having described my invention, I claim—

1. A blank for a joist hanger consisting of a wrought metal plate having a thickened rib on one edge which rib is extended beyond said plate on both ends thereof, substantially as and for the purpose specified.

2. A blank for a joist hanger consisting of a wrought metal plate having unequal parallel sides and oppositely inclined ends, and having a thickened rib on the edge of the long side, which rib is extended beyond the plate at both ends thereof, substantially as and for the purpose specified.

3. A wrought metal joist hanger consisting of a plate bent on lines c, and c, forming the horizontal shelf a^3 and the two parallel sides a^4 a^4, having a thickened strengthening rib a on the rear edge of said shelf and sides, and having said rib extended beyond both sides and bent backward to form the supporting arms a^2 a^2, substantially as and for the purpose specified.

In testimony whereof I affix my signature in presence of two witnesses.

JAMES H. VAN DORN.

Witnesses:
E. W. MOWERY,
E. L. THURSTON.