No. 619,060.

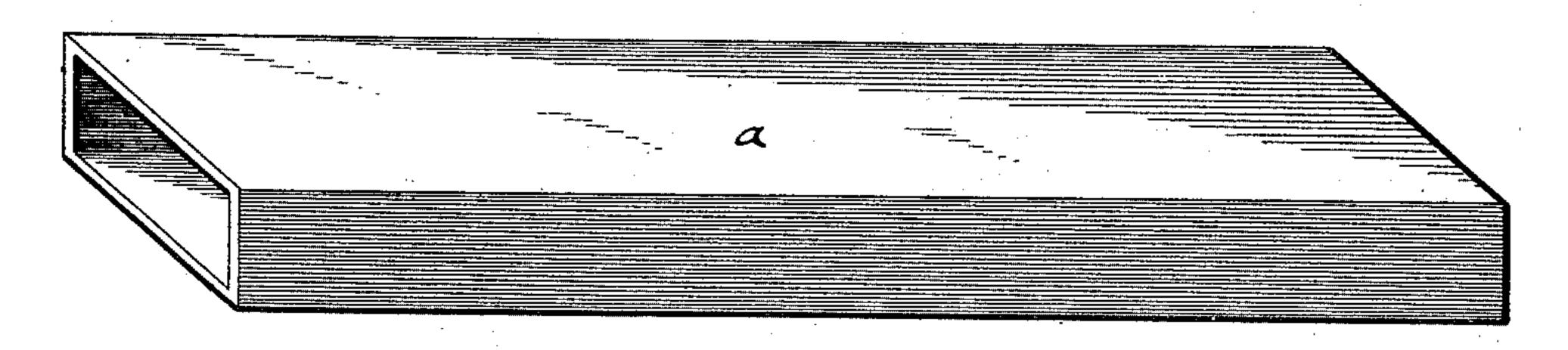
Patented Feb. 7, 1899.

## F. WESEL. PRINTER'S FURNITURE.

(Application filed Feb.19, 1898.)

(No Model.)

FIG.1.



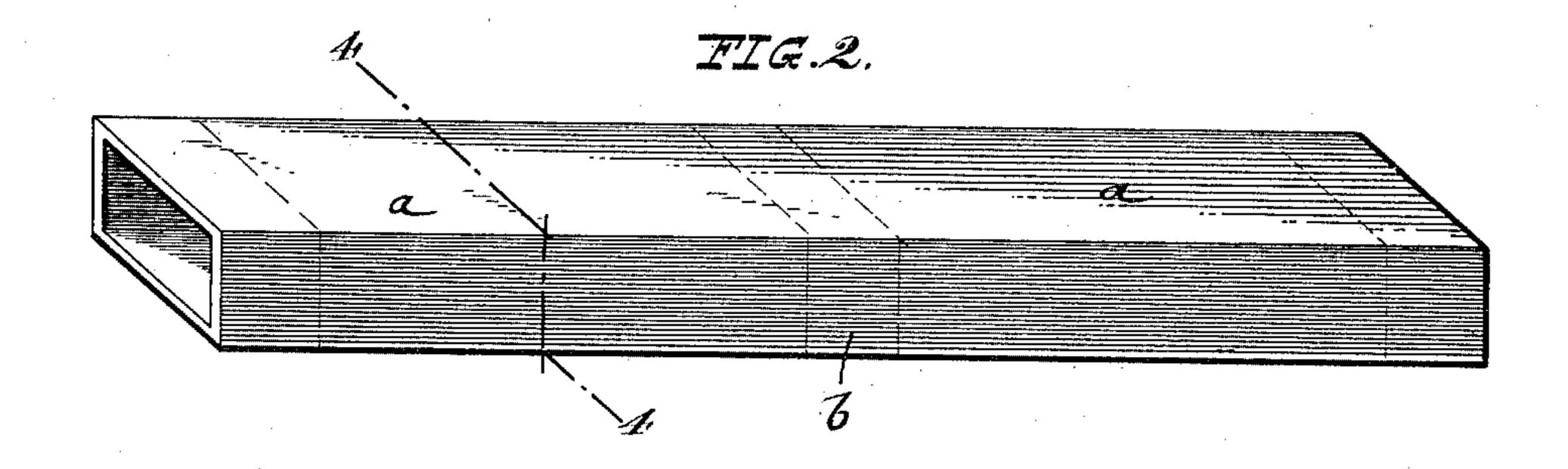


FIG. 3.

MITNESSES:
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## United States Patent Office.

FERDINAND WESEL, OF NEW YORK, N. Y.

## PRINTERS' FURNITURE.

SPECIFICATION forming part of Letters Patent No. 619,060, dated February 7, 1899.

Application filed February 19, 1898. Serial No. 670,891. (No model.)

To all whom it may concern:

Be it known that I, FERDINAND WESEL, a citizen of the United States, residing at New York, in the borough of Brooklyn and State of New York, have invented certain new and useful Improvements in Printers' Furniture, of which the following is a specification.

The so-called printers' "labor-saving" furniture heretofore employed in printing-offices was usually made of wooden blocks of various lengths and widths, as required in locking up and adjusting book or other pages, known as "forms," into a chase. Said wooden furniture has the disadvantage of changing with the temperature by shrinking, warping, or swelling, so that it is rendered uneven. It also wears uneven and soon loses its more or less accurate original shape, thus necessitating the frequent replacing by entirely new sets where accurate work is required.

The object of my invention is to furnish in place of wooden furniture a labor-saving furniture made of seamless tubular metal, preferably sheet-steel, which is drawn to the proper size; and the invention consists of printers' labor-saving furniture made of sheet metal drawn to proper shape and according to the different lengths and the absolutely accurate widths required.

In the accompanying drawings, Figures 1, 2, and 3 represent perspective views of different sizes of my improved labor-saving metallic furniture for printing-offices. Figs. 4 and 5 are vertical transverse sections respectively on line 4 4, Fig. 2, and 5 5, Fig. 3.

My labor-saving printers' furniture is drawn from sheet metal, preferably sheetsteel, any height and being cut off to the required length. For making the seamless 40 sheet-metal furniture  $\alpha$  as many dies as there are sizes have to be made, the furniture being drawn on said dies in the usual manner, so that rectangularly-arranged side walls from end to end are produced. The furniture a45 may be provided at the ends at b with short wooden or other metallic blocks, which are fitted snugly in the same, so as to prevent the ingress of dust to the interior of the furniture, or a central transverse block may be in-50 serted, both as indicated in dotted lines, Figs. 2 and 3. With this labor-saving metallic furniture the advantages claimed over any other now in use are that no matter what amount of pressure is usually brought to bear upon

such furniture in the forms it will in no way 55 injure its true and original shape and accurate proportions and that it can be used for any length of time without deterioration or any change in the same. This metallic labor-saving furniture will also save a great deal of time 60 over any other on account of its being so accurate and remaining so, as all wood and softmetal furniture soon becomes so inaccurate that pages of type and forms are thrown out of true, and the furniture cannot be depended 65 upon, thus causing trouble and great delay in adjusting it. All this is overcome by this furniture. Nor does the washing of forms with water and lye affect my furniture in the least, as in wooden furniture, which swells it 70 out of shape. Another great advantage is the lightness of construction of this metallic furniture, as it makes the forms almost as light as if locked up with wood, and, again, where several pages are required to be made up re- 75 quiring accurate register this metallic furniture, being always true and accurate, facilitates things greatly, saving a great deal of time and assuring an absolute register to pages on reverse sides. This is especially so 80 in regard to color-work, which requires absolute register, and the present invention will be found to be indispensable because of its always remaining true and accurate.

I am aware that printers' furniture has been 85 made of honeycombed metallic structures of suitable size and shape, and I do not, therefore, broadly claim printers' furniture of metal; but I am not aware that previous to my invention it was ever proposed to construct 90 printers' furniture which is light in weight of suitable lengths of tubular sheet metal.

Having thus described my invention, what I claim is—

1. Printers' furniture, composed of rectan- 95 gular and seamless metallic tubing, substantially as set forth.

2. Printers' furniture, composed of rectangular and seamless metallic tubing having four continuous side walls from end to end. 100

In testimony that I claim the foregoing as my invention I have signed my name in presence of two subscribing witnesses.

FERDINAND WESEL.

Witnesses:

PAUL GOEPEL, GEO. W. JAEKEL.