(No Model.)

H. H. THORNTON.

PAIL, &c., MADE OF STAVES.

No. 412,212. Patented Oct. 1, 1889.

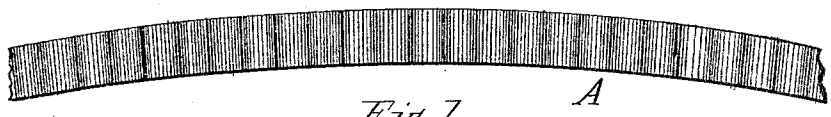


Fig. 1.

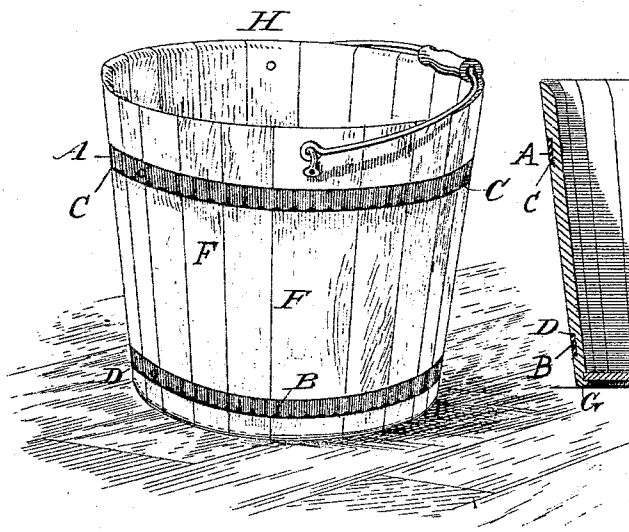


Fig. 2.

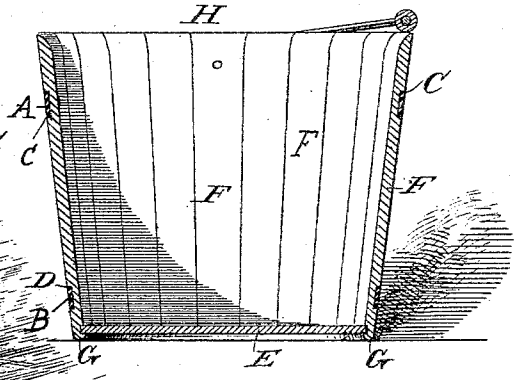


Fig. 3.

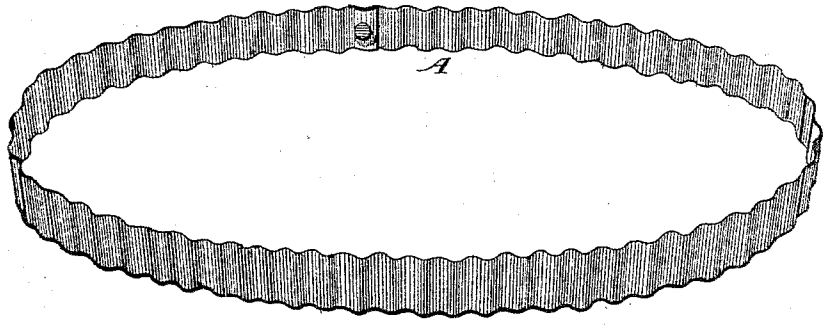


Fig. 4.

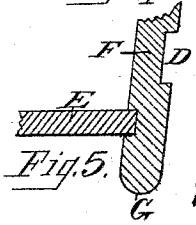


Fig. 5.

Witnesses.
Matthew Garnett
George F. Walton

Inventor.
Henry H. Thornton by
Harris Dunlaven his Atty.

N. PETERS. Photo-Lithographer, Washington, D. C.

UNITED STATES PATENT OFFICE.

HENRY H. THORNTON, OF BOSTON, MASSACHUSETTS.

PAIL, &c., MADE OF STAVES.

SPECIFICATION forming part of Letters Patent No. 412,212, dated October 1, 1889.

Application filed February 11, 1889. Serial No. 299,508. (No model.)

To all whom it may concern:

Be it known that I, HENRY H. THORNTON, of Boston, in the county of Suffolk and State of Massachusetts, have invented a new and useful Improvement in Pails, Tubs, and Articles Made of Staves, of which the following, taken in connection with the accompanying drawings, is a specification.

My invention relates to improvements in pails, tubs, and articles made of staves; and the objects of my improvements are to readily construct pails, &c., durable and strong, provided with two hoops corrugated and adapted to the slanting surface of the pails, &c.; also, to round the bottom of the pail-staves, &c., so that the same may not chip or fracture easily. I attain these objects by means of the mechanism illustrated in the accompanying drawings, in which—

Figure 1 is a plan of the blank from which the hoop is formed. Fig. 2 is a perspective view of a pail embodying my invention. Fig. 3 is a longitudinal vertical section of the same. Fig. 4 is a perspective view of the hoop. Fig. 5 is a vertical sectional view of the stave and bottom.

Similar letters refer to similar parts throughout the several views.

I have shown for the purpose of illustration a pail embodying my invention.

H is the pail, formed in the usual manner of the staves F, which have the circumferential grooves C and D, as shown in Fig. 2. The staves F are chamfered or preferably rounded at their ends G, as shown in Fig. 5.

E represents the bottom, of usual form and construction.

A and B are hoops formed of corrugated ribbons of metal, the form and construction of which ribbons are more particularly described in the specification accompanying my application for Letters Patent for an improvement in machines for corrugating ribbons of metal, dated on or about June 28, 1888, and the ends of the ribbon are riveted together to form said hoop.

The corrugated ribbons of metal when made as described in the specification above referred to have a continuous even curvature, as specially set forth in said specification, making a blank for the hoop, as shown in Fig. 1, and when the same is formed into a hoop the curvature of the ribbon renders the hoop thus formed applicable to the slanting surface of the pail. The elasticity of the hoop arising from the continuously-corrugated ribbon of metal allows said hoop to be driven over the staves into the grooves and yet retain its adaptation to the slanting surface of the pail. The hoops also maintain a uniform tension upon the staves and are readily and easily driven into place.

The pail made with the hoops described does not require more than two hoops, arranged as shown in Fig. 2, and the bottom hoop is some distance above the ends of the staves, which are rounded, as stated, so that the pail may rest on the center of the staves, which are not liable to chip or fracture.

It is obvious that the hoop ordinarily put around the edge of the staves is done away with by my invention, and the pail may be placed upon a surface without scratching or disfiguring by rust said surface.

I therefore claim and desire to secure by Letters Patent—

1. A hoop comprising a band of metal of even curvature, having cross corrugations or crimps which normally slant in correspondence to the slanting surface of a bilged or slanting vessel, substantially as set forth.

2. A bilged or slanting vessel having circumferential grooves containing hoops of metal of even curvature, having cross corrugations or crimps which normally slant in correspondence to the slanting surface of said vessel, all substantially as set forth and described.

3. A bilged or slanting vessel having circumferential grooves containing metal hoops of even curvature, having cross corrugations or crimps normally slanting in correspondence to the slanting surface of said vessel, the lower ends of the staves forming said vessel being rounded, all substantially as described.

In testimony whereof I have signed my name to this specification, in the presence of two subscribing witnesses, on this 9th day of February, A. D. 1889.

HENRY H. THORNTON.

Witnesses:
F. DUNHAM,
H. DUNHAM.