

(No Model.)

C. WITTKOWSKY.
BARREL.

No. 537,592.

Patented Apr. 16, 1895.

Fig. 1.

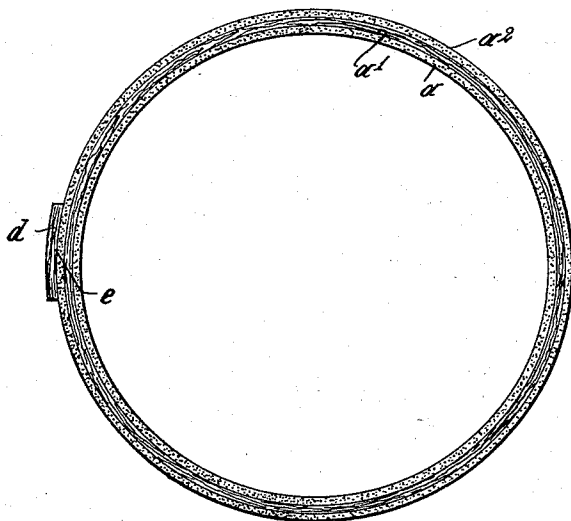
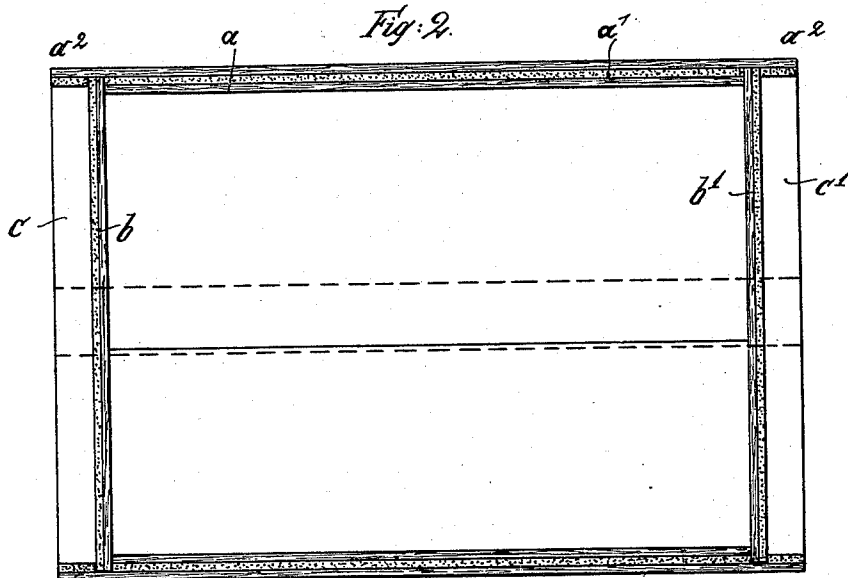


Fig. 2.



Witnesses:
Carl Popstach
R. Herpich.

Inventor:
Carl Wittkowsky
by *Robert J. Leo*
Attorney.

UNITED STATES PATENT OFFICE.

CARL WITTKOWSKY, OF BERLIN, GERMANY.

BARREL.

SPECIFICATION forming part of Letters Patent No. 537,592, dated April 16, 1895.

Application filed February 1, 1892. Serial No. 419,979. (No model.)

To all whom it may concern:

Be it known that I, CARL WITTKOWSKY, a subject of the King of Prussia, German Emperor, and a resident of Berlin, in the Kingdom of Prussia, German Empire, have invented certain new and useful Improvements in the Manufacture of Wooden Barrels, of which the following is a specification.

My invention relates to a method of manufacturing wooden barrels consisting of veneers, and the object of my invention is to produce barrels that are not liable to crack or break, and are light as well as completely waterproof.

In carrying my improved method into practice, I first produce a three-ply veneer-board by uniting three plates of veneer by means of a watertight glue, and in a flat state. The arrangement of the three plates with regard to their grains is such a one, that the grain of the middle—or central—veneer is run perpendicularly to the longitudinal axis of the barrel to be produced, while the grains of the two outer plates of veneer are running rectangularly to the grains of the said inner veneer, or parallel to the longitudinal axis of the barrel to be produced.

The three plates of veneer united by the waterproof glue are kept in their flat position until the glue has become perfectly dry. Thereafter, the three-ply veneer-board is bent into the proper shape so as to form a cylinder. Before, however, bending the veneer-board, I cut those two edges, by means of which the cylinder is afterward closed, obliquely; and after having bent the board, I unite the said two oblique edges by means of the same waterproof glue. The line of junction is at the outer side of the barrel covered by a strip of veneer, which is also fixed to the mantle by means of the said glue; after this, the bottoms are inserted and fixed.

Figure 1 is a cross-section through my improved barrel. Fig. 2 is a longitudinal section through the same.

In said figures a' is the middle—or inner veneer, the grains of which are run around the barrel, or rectangularly to the longitudi-

nal axis of the same. a and a^2 are the two other veneers, one of which (a^2) lies at the outside of the mantel, while the other one (a) lies at the inside of the same. The grains of these two plates are crossing those of the third, *i. e.*, the inner one.

The breadth of the plates of veneer (with regard to the length of the barrel) is different, in that the outer veneer a^2 is broader than the two other ones, so that at each frontal side of the barrel, a part of the outer veneer projects over the two other ones. The edges of these latter are forming the seat for the bottoms $b b'$, as distinctly to be seen in Fig. 2, and the bottoms after being placed upon the said seats are secured in place by a suitable strip c , or c' respectively, of veneer glued with its outer surface to the inner surface of the projecting end of the outer veneer a^2 .

It will be seen, that the bottoms shown in Fig. 2 are consisting each also of two crossed plates of veneer. This, however, does not form a part of my invention.

d , Fig. 1, is a strip of veneer covering the outer line of junction between the two inclined surfaces of junction e , (Fig. 1,) and it will be seen, that by broadening the said surfaces the junction becomes by far a better one.

Having thus fully described the nature of this invention, what I desire to secure by Letters Patent of the United States is—

The method of manufacturing wooden barrels, consisting in uniting by means of waterproof glue three plates of veneer in a flat state, letting said glue become dry, bending then the three-fold veneer board, and uniting the opposite edges by waterproof glue, the line of junction being covered by a strip of veneer also fixed by waterproof glue, and inserting finally the bottoms, substantially as described.

In testimony whereof I have signed this specification in the presence of two subscribing witnesses.

CARL WITTKOWSKY.

Witnesses:

AD. LOBE,
W. HAUPT.