

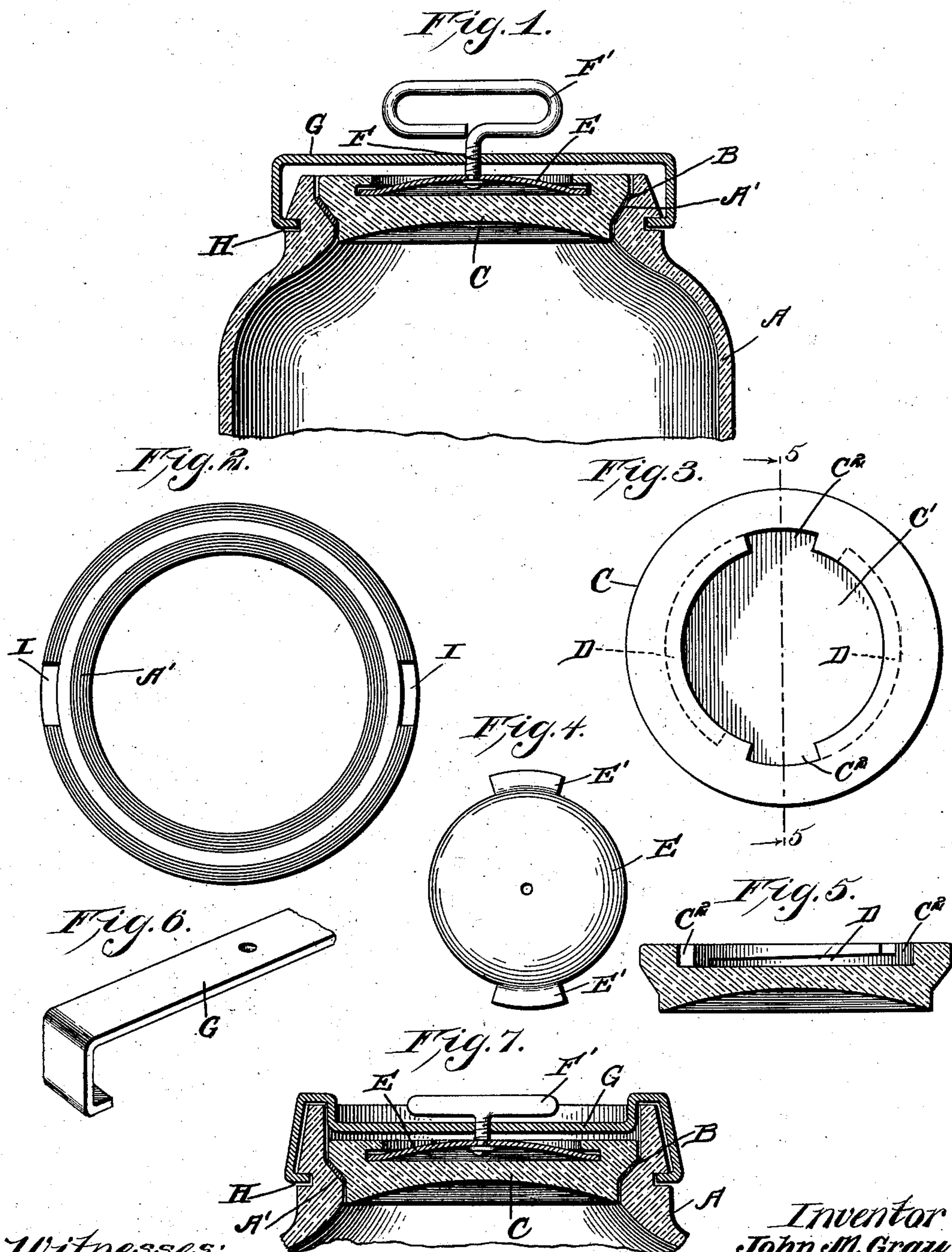
No. 746,496.

PATENTED DEC. 8, 1903.

J. M. GRAU.
PRESERVING JAR.

APPLICATION FILED APR. 23, 1903.

NO MODEL.



Witnesses:

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JOHN M. GRAU, OF PHILADELPHIA, PENNSYLVANIA.

PRESERVING-JAR.

SPECIFICATION forming part of Letters Patent No. 746,496, dated December 8, 1903.

Application filed April 23, 1903. Serial No. 153,940. (No model.)

To all whom it may concern:

Be it known that I, JOHN M. GRAU, a citizen of the United States, residing at Philadelphia, county of Philadelphia, and State of Pennsylvania, have invented a certain new and useful Improvement in Preserving-Jars, of which the following is a specification.

My invention relates to a new and useful improvement in preserving-jars, and has for its principal object to provide a jar with a cover fitting hermetically within the mouth of the jar and being forced downward by screw-pressure, and the same screw used for forcing the cover downward is utilized for raising the cover before the same is entirely removed from the jar.

With these ends in view this invention consists in the details of construction and combination of elements hereinafter set forth and then specifically designated by the claims.

In order that those skilled in the art to which this invention appertains may understand how to make and use the same, the construction and operation will now be described in detail, referring to the accompanying drawings, forming a part of this specification, in which—

Figure 1 is a vertical sectional view of the upper portion of the jar, with my improvement applied thereto; Fig. 2, a plan view of the mouth of the jar; Fig. 3, a plan view of the cover; Fig. 4, a plan view of the disk whereby the screw is attached to the cover; Fig. 5, a section taken on the line 5 5 of Fig. 3; Fig. 6, a perspective view of one end of the clamp; Fig. 7, a vertical section through the upper portion of a jar, showing my improvement applied thereto in a modified form.

A represents the jar, the mouth of which is provided with an internal annular beveled surface A', upon which the rubber packing B is adapted to fit.

C is the cover adapted to fit within the mouth of the jar, and this cover is provided with an external annular beveled surface corresponding to the beveled surface A' of the jar, and when the cover is in place the packing B is interposed between these two beveled surfaces. The upper face of the cover is provided with a cavity C', and on each side of the cavity are undercut grooves D, communicating with the cavity C', and upon op-

posite sides are extensions C² of the cavity C', and one of these extensions communicate with one end of one of the undercut grooves D and the other extension communicates with one end of the other undercut groove, the other ends of the grooves being closed, as shown in Fig. 3.

E is a disk provided upon opposite sides with wings E', said wings being of such a size as to pass downward through the extensions C² of the cavity C', and then by turning the disk the wings E' will pass into the undercut grooves D, and thus the disk will be locked to the cover so it cannot be removed therefrom until the wings are again brought in register with the extension C².

F is a screw swiveled to the disk E, and this screw is threaded through a clamp G, which clamp passes over about the mouth of the jar and down upon each side, and its ends are bent inward and adapted to lie within an annular groove H, formed around the outside of the neck of the jar. Cut-away portions I are formed upon opposite sides of the jar, communicating with the groove H, whereby the clamp G may be attached to the jar by passing the ends of the clamp downward through the cut-away portion or notches I and then turning the clamp so that its ends are in the groove H.

F' is a thumbhold upon the upper end of the screw F for turning the same.

It will thus be seen that to secure the cover in place the cover is placed in the mouth of the jar at the same time as the clamp is passed downward through the openings I, and then after the clamp is turned so that its ends will enter the groove H the screw F is turned so that the cover C will be forced downward tightly upon the packing B, forming an airtight closure, and after the contents of the jar has cooled a partial vacuum will be formed, as is well known, and the cover will be also held in its place by this means.

I am aware that jars have been patented and manufactured in which the cover has been forced downward by either clamp or screw pressure; but in all such forms of jars it is extremely difficult to disengage the cover from the jar when it is desired to open the same, as the cover becomes cemented into the jar by the syrup from the preserves and also

held by the partial vacuum formed by the cooling of the contents of the jar. In my improved jar when the same is about to be opened the screw is turned in the reversed
 5 direction, and in passing upward through the clamp it will draw upward upon the cover and disengage the same from its seat, and then by turning the clamp until the ends of the same register with the openings in the
 10 cover and clamp may be raised together.

In Fig. 7 I have shown a modified construction embodying the same principle as described, but so formed that the screw and thumb-piece of the same will lie below the
 15 top line of the clamp, so that the jar may be more easily packed for shipment and may be caused to rest upside down, if so desired.

Of course I do not wish to be limited to the exact construction hereshown, as slight modifications could be made without departing
 20 from the spirit of my invention—as, for instance, other means could be employed for securing the screw to the cover. The means I have shown in the drawings is probably the
 25 most practical, as all parts may be removed for cleansing and may be easily and quickly inserted in place, or other devices could be used, if desired.

Having thus fully described my invention,
 30 what I claim as new and useful is—

1. In a preserving-jar, a cover adapted to fit within the mouth of the jar and seat within the same upon suitable packing, a removable clamp extending above and across the mouth
 35 of the jar, the ends of the clamp being turned down and inward, the jar being provided with an annular groove formed around the exterior of the same in which the ends of the clamps are adapted to normally rest, cut-
 40 away portions formed upon opposite sides on the outside of the jar communicating with and extending upward from the annular groove through which the clamp may be removed, a thumb-screw threaded through the
 45 clamp, means for securing and swiveling the lower ends of the screw to the cover, as and for the purpose specified.

2. In a preserving-jar, an interior annular beveled surface formed in the mouth of the
 50 jar, a cover adapted to fit within the mouth

of the jar and provided with an exterior annular beveled surface, a packing interposed between the two beveled surfaces, a clamp extending above and across the mouth of the
 55 jar, the ends of the clamp being turned downward and then inward, an external annular groove formed in the neck of the jar in which the ends of the clamp are adapted to normally lie, cut-away portions upon opposite
 60 sides of the jar whereby the clamp may be removed, a thumb-screw threaded through the clamp, a disk to which the lower end of the thumb-screw is swiveled, and means for removably securing said disk to the cover, as
 65 and for the purpose specified.

3. In a preserving-jar, an annular beveled seat formed within the mouth of the jar, a cover adapted to fit within the mouth of the jar, a packing interposed between the seat and the cover, a clamp passing across and
 70 above the mouth of the jar, the ends of said clamp bending downward and then inward, an external annular groove formed around the neck of the jar in which the ends of the clamp rest, cut-away portions upon opposite
 75 sides of the jar extending upward from the annular groove, a thumb-screw threaded through the clamp, the cover provided with a cavity upon its upper face, undercut grooves upon opposite sides of the cavity and com-
 80 municating with the same extensions of the cavity upon opposite sides, one extension communicating with one end of one groove, and the other extension communicating with one end of the other groove, a disk to which
 85 the lower end of the thumb-screw is swiveled in the center, wings formed with said disk, said disk adapted to pass downward into the cavity of the cover, the wings adapted to pass through the extensions of the cavity and then
 90 enter the undercut grooves by the turning of the disk whereby said disk is secured to the cover, as and for the purpose specified.

In testimony whereof I have hereunto affixed my signature in the presence of two
 95 subscribing witnesses.

JOHN M. GRAU.

Witnesses:

MARY E. HAMER,
 L. W. MORRISON.