

W. F. GRAMPP & W. D. CARSON.

ENVELOP.

APPLICATION FILED MAR. 7, 1912.

1,047,515.

Patented Dec. 17, 1912.

2 SHEETS-SHEET 1.

Fig. 1.

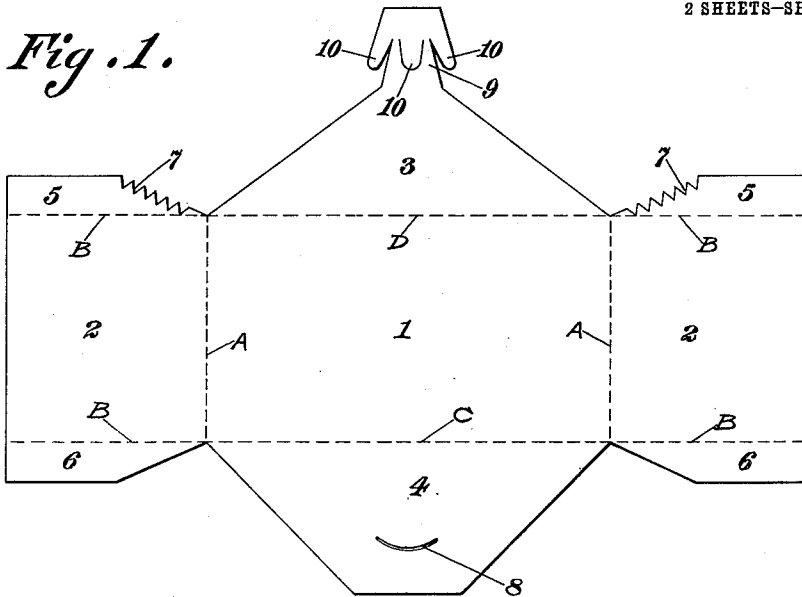


Fig. 2.

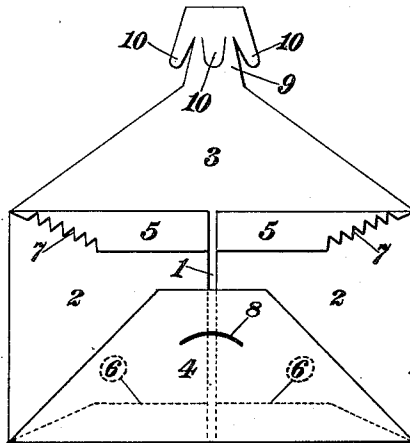
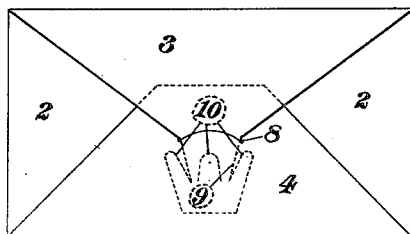


Fig. 3.



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2 SHEETS—SHEET 2.

Fig. 4.

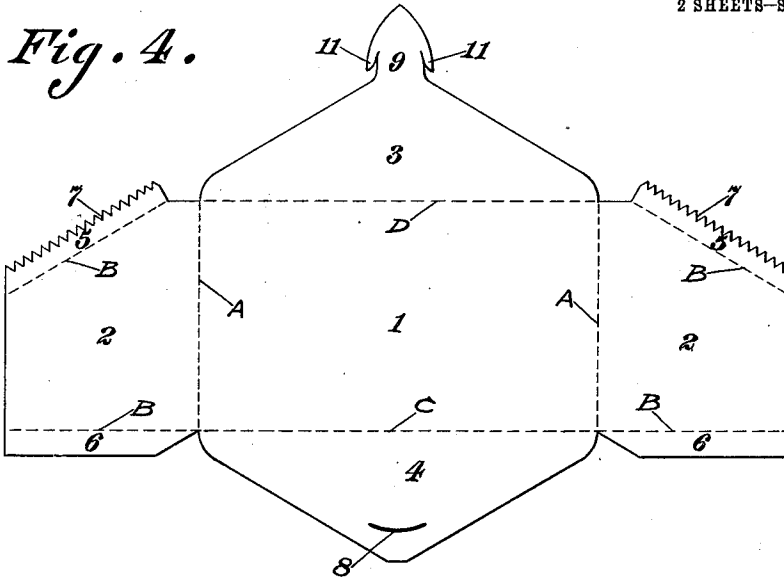


Fig. 5.

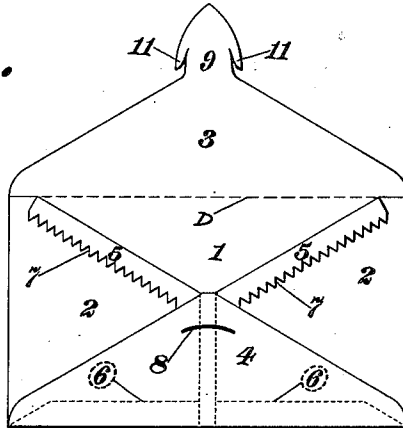
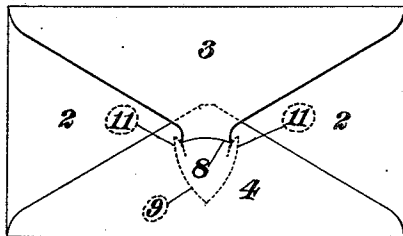


Fig. 6.



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UNITED STATES PATENT OFFICE.

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ENVELOP.

1,047,515.

Specification of Letters Patent.

Patented Dec. 17, 1912.

Continuation of application Serial No. 561,480, filed May 14, 1910. This application filed March 7, 1912.
Serial No. 682,224.

To all whom it may concern:

Be it known that we, WILLIAM F. GRAMPP and WILLIAM D. CARSON, citizens of the United States, residing at the city of St. Louis, State of Missouri, have invented certain new and useful Improvements in Envelops, of which the following is a specification.

This application is a continuation of the application of William D. Carson and William F. Grampp, Serial No. 561,480, filed May 14, 1910.

This invention relates to improvements in envelops, and has for its primary object to provide an envelop having novel means for sealing same in addition to the ordinary sealing means, whereby an effective double seal is formed so that the sealed envelop can not be opened without being mutilated.

Further, the present invention consists of certain novel features of construction and arrangement of parts as will be hereinafter more fully described and pointed out in the claim.

In the accompanying drawings forming part of this specification, in which like numbers of reference denote like parts wherever they occur, Figure 1 is a plan view of the blank from which this improved envelop is formed; Fig. 2 is a rear elevation of the completed envelop, showing same open; Fig. 3 is a similar view showing the envelop closed and sealed ready for mailing; Fig. 4 is a plan view of the blank from which an envelop that embodies an alternate form of the invention is formed; Fig. 5 is a rear elevation of the completed alternate form of the invention, showing same open; and Fig. 6 is a similar view of same shown closed and sealed ready for mailing.

The blank from which the envelop is formed comprises the body or face portion 1, flaps 2 at the opposite ends thereof, and flaps 3 and 4 at the top and bottom, respectively, of said body portion. Each flap 2 is preferably formed with a rectangular configuration and is provided at the upper and lower edges thereof with extensions 5 and 6, respectively, the edge of each extension being preferably beveled at its inner end, and the beveled edge of the extension 5 being ser-

rated to form teeth 7 thereon, for the purpose hereinafter described. The upper flap 3 and the lower flap 4 are formed somewhat triangular in shape, and the latter is provided with a slot 8 near its free end, said slot being preferably arcuated and adapted to receive a locking tongue 9 formed at the apex of the upper flap 3. The tongue 9 is provided with a plurality of inwardly-extending diverging fangs 10, there being preferably three of said fangs, two of which project from opposite sides of the body portion of said tongue, and the third being located in substantially the middle of the body portion of said tongue between the two side fangs. The body portion of the tongue 9 converges inwardly and, at its widest part, is approximately equal in width to the length of the slot 8, in order to fit in the latter, while the greatest width of the tongue 9, *i. e.*, the distance between the outer extremities of the side fangs 10, is relatively greater than the length of the slot 8, so that, when the tongue 9 is inserted in the slot 8, the fangs 10 are pressed inwardly by the ends of the slot 8 until after said tongue has entered said slot, whereupon the fangs 10 spread outwardly and thereby effectively prevent the withdrawal of said tongue without tearing or injuring one or more of said fangs.

A suitable adhesive is preferably applied to the inner faces of the extensions 5 and 6 and, also, to the inner faces of the flaps 3 and 4, adjacent the edges thereof. In order to form the completed envelop from the blank hereinabove described, the end flaps 2 are folded against the rear or inner face of the body portion 1, along the dotted lines A, and the extensions 5 and 6 are then folded outwardly along the dotted lines B and the adhesive thereon is moistened to cause said extensions to adhere to the outer faces of the flaps 2, said flaps 2 being preferably formed with such length that the end edges thereof nearly touch at the middle of said body portion, as best seen in Fig. 2. The bottom flap 4 is then folded over the flaps 2, along the dotted line C, and sealed thereto by the adhesive on its inner face in the manner of an ordinary envelop. The envelop is thus completed, as shown in Fig. 2, and is ready to

receive a letter or any other article to be mailed.

In order to close and seal the envelop, the flap 3 is folded against the flaps 2, and the tongue 9 is then forced through the slot 8, and, by reason of the side fangs 10 being much farther apart than the length of said slot, said fangs will be pressed inwardly while entering said slot and will, after passing entirely through said slot, regain their original positions relative to the body portion of said tongue, as depicted in Fig. 3, thereby forming a lock which can not be opened without detection, *i. e.*, in case an effort is made to withdraw the tongue 9 from the slot 8, the side fangs 10 will lock themselves in the ends of the slot 8 and the middle fang 10 will hook itself on the upper edge of said slot, with the result that said tongue is prevented from being withdrawn from said slot, without one or more of said fangs being torn or injured, and thus the opening of the envelop after once being closed will be readily detected. When the upper flap 3 is folded against the flaps 2 as just described, the former covers the extensions 5 and 6 and parts of the flaps 2 and 4, and, if desired, by moistening the adhesive on the inner face of said flap 3, same may be sealed to parts of the outer face of the extensions 5 and flaps 2 and 4. Some of the adhesive on flap 3 not only adheres to the teeth 7, but, also, to the flaps 2 in the spaces between said teeth, thereby forming a double seal near the upper corners of said flap 3. This double seal formed by the flap 2 and the serrated extensions 5 produces indentations on the flap 3 which can not be readily removed, and should the extensions be unsealed and withdrawn they could never be replaced to cause the teeth 7 to conform to the indentations first made in the flaps 2, and hence the opening of the envelop would be readily detected. After the envelop is sealed and the tongue 9 is inserted into the slot 8 as hereinabove described, the double seal and the locking tongue 9 prevent the envelop from being opened without detection.

In the alternate form of the blank depicted in Fig. 4, same has the body portion 1, end flaps 2, and upper and lower flaps 3 and 4, but instead of each flap 2 being formed with a rectangular configuration, the upper edge of same slopes downwardly from a point near the inner end thereof and the extension 5 is formed on the sloping edge of said flap 2, said extension having its upper or longest edge serrated to form the teeth 7 thereon. The flap 4 has the arcuated slot 8 formed therein, in order to receive the tongue 9 borne by the apex of the flap 3. Said tongue 9, in this form, is preferably formed with somewhat of a semi-elliptical configuration having its end pointed to readily enter the slot 8, and each side

of said tongue is provided with an ear or fang 11, the greatest width of said tongue, *i. e.*, the distance between the extremities of said ears being relatively greater than the length of the slot 8. As hereinabove described, an adhesive is applied to the inner faces of the extensions 5 and 6 and, also, to the inner faces of the flaps 3 and 4 adjacent the edges thereof. The end flaps 2 are first folded against the inner face of the body portion 1 along the dotted lines A, and the extensions 5 and 6 are then folded outwardly along the dotted lines D, and the adhesive matter thereon is moistened to cause said extensions to adhere to the outer faces of the flaps 2. The bottom flap 4 is then folded over the flaps 2, along the dotted line C, and sealed thereto by the adhesive on its inner face as hereinabove described, so as to form the completed envelop as illustrated in Fig. 5. In order to close and seal the envelop, the upper flap 3 is folded over the flaps 2, along the dotted line D, and the tongue 9 is then inserted through the slot 8 in flap 4. The ears 11 being much farther apart than the length of the slot 8, said ears are pressed inwardly while the same enter said slot and, after passing entirely through said slot, will spread outwardly and assume their normal position relative to the body portion of said tongue as depicted in Fig. 6, thereby preventing said tongue from being withdrawn from the slot 8 without one or both of said ears being torn or injured and thus the opening of the envelop will be readily detected. The adhesive matter on the inner face of flap 3 is moistened so as to seal said flap to the extensions 5 and flaps 2 and 4, and some of the adhesive not only adheres to the teeth 7, but, also, to the flaps 2 in the spaces between said teeth, thereby forming a double seal which, in this form, extends along substantially the entire length of each extension 5. This double seal and the locking tongue 9 prevent the opening of the sealed envelop without detection as hereinabove described.

We claim:

An envelop comprising a body portion having end flaps, a bottom flap and a sealing flap, the end flaps being folded against the body portion and each having a top and bottom extension, the top edge of each top extension having an inclined portion which is provided with spaced teeth, each of said top and bottom extensions of both end flaps being folded onto and secured to the outer face of the end flap that bears same, the bottom flap being folded onto the outer faces of the end flaps and over the outer faces of the bottom extensions of the end flaps and completely overlying same, the sealing flap being provided with adhesive which when the sealing flap is closed adheres to the teeth of the end flap top extensions and with

the end flaps in the spaces between the teeth
to form a double seal, said teeth when the
sealing flap is pressed into place forming in-
dentations in said sealing flap, and said seal-
5 ing flap in closed position completely over-
lying the top extensions of the end flaps.

In testimony whereof we hereunto affix

our signatures in the presence of two wit-
nesses.

WILLIAM FREDRICK GRAMPP.
WILLIAM DAVID CARSON.

Witnesses:

GEORGE G. ANDERSON,
BERTHA VON BEHRENS.