

F. A. ANTONI.
CORRUGATED PASTEBOARD WRAPPER.
APPLICATION FILED NOV. 2, 1911.

1,061,654.

Patented May 13, 1913.
2 SHEETS—SHEET 1.

Fig.1.

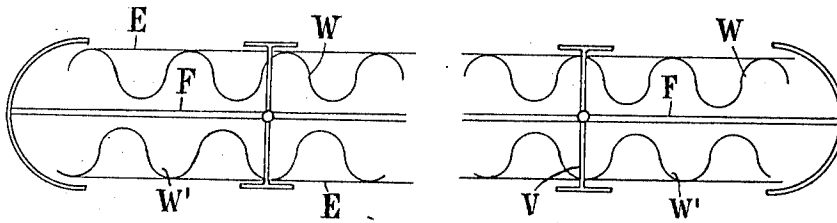
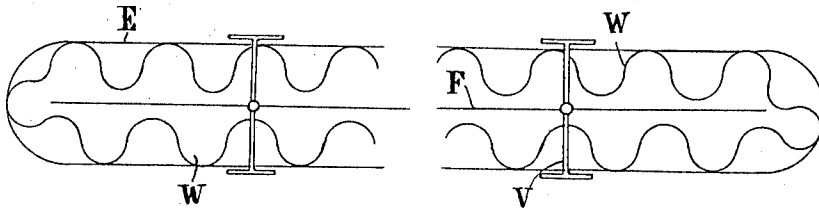


Fig.2.



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2 SHEETS—SHEET 2.

Fig. 3.

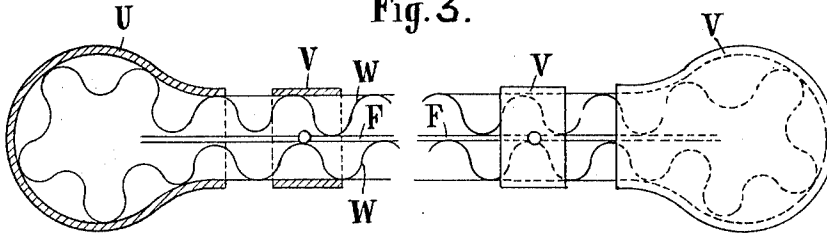


Fig. 4.

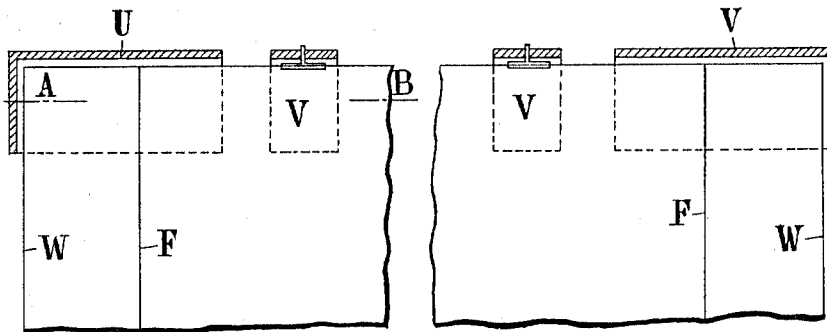
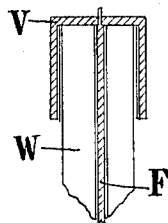


Fig. 5.



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UNITED STATES PATENT OFFICE.

FRIEDRICH AUGUST ANTONI, OF COLOGNE-EHRENFELD, GERMANY.

CORRUGATED PASTEBOARD WRAPPER.

1,061,654.

Specification of Letters Patent.

Patented May 13, 1913.

Application filed November 2, 1911. Serial No. 658,247.

To all whom it may concern:

Be it known that I, FRIEDRICH AUGUST ANTONI, subject of the German Emperor, residing at Lichtstrasse 25, Cologne-Ehrenfeld, Germany, have invented certain new and useful Improvements in Corrugated Pasteboard Wrappers, of which the following is a specification.

Corrugated paste-board protective rolls, as hitherto known, consist either of a single corrugated layer of paste-board or of two of such layers fastened upon a smooth intermediate backing. These protective rolls, in order that they may be capable of being rolled up, are able to have only one flat paper paste-board or cloth surface stuck upon one side; the other side must remain unstuck, and the roll does not present a good appearance on this side.

This invention consists of a protective wrapper made out of corrugated paste-board which can have a smooth paper paste-board or cloth layer stuck upon its two outer sides without prejudicially affecting its adaptability for being rolled up. This is accomplished by arranging two single corrugated paste-board layers which are pasted over on one side with their smooth sides outermost, and so that upon being rolled the corrugations which project inward freely are prevented from engaging in one another by the interposition of a smooth loose inner layer which separates the corrugated faces from one another, and provides a surface upon which they can rub. Obviously the two corrugated layers can consist of a single layer doubled over in the form of an endless band with the smooth dividing layers between them. In order to prevent the two corrugated layers from bending away from the middle layer, uniting means are provided upon both faces secured to one of the corrugated layers or to the middle layer, holding the whole together in such a way as not to affect its bending in either direction.

In the accompanying drawing two forms of the invention are shown.

Figure 1 shows the wrapper consisting of the two corrugated paste-board layers W W specially arranged with their smooth sides E outward, and the loose separating layer F between them. The two layers W W are held together above and below by ties V,

which are fastened to the middle layer F and engage in the outer side of the walls E or corrugations W.

Fig. 2 shows the modification of the wrapper in which an endless corrugated band W, having the smooth surface E outermost, is folded around the loose center layer F. In this form also ties such as V are used.

In Figs. 3, 4, 5 of the drawings the invention is shown in the form of a protective wrapper showing the corrugated layers movable in relation to one another, the right hand side of Fig. 3 showing a plan, and the left hand side a horizontal section on line A—B of Fig. 4. Figs. 4 and 5 are a vertical longitudinal cross section of Fig. 3 respectively. In this form a number of clamped shaped members U V shaped in cross section like U are held together by cords or chains T, which are of a length corresponding to the length of the wrapper. The two end members U are bow shaped and of a length corresponding to the length of the wrapper. The two end members U are bow shaped and of convenient length to insure the ends of the corrugated layers being guided within them. The central members B are shorter than the others, whose cross section remains always the same, they grip around the edge of the wrapper above or below in such a way that the two outer corrugated layers W are pressed lightly against the smooth inner screen F, such corrugated layers W being movable in relation to one another between the overlapped edges of the members. The members U V are secured to the inner screen F or to one of the two outer walls W in any known manner.

What I claim is:—

A protective wrapper comprising layers of pasteboard having smooth and corrugated faces and disposed with their smooth faces outermost, a layer loosely disposed between the juxtaposed corrugated faces, and means movably connecting said layers, substantially as and for the purposes set forth.

In testimony whereof, I affix my signature in the presence of two witnesses.

FRIEDRICH AUGUST ANTONI.

Witnesses:

CAMILLA CRINDMANN,
HEINRICH OSTWALD.