May 31, 1955 L. P. MACRAE ET AL 2,709,468

NON-DRIP TOILET TANK COVER

Filed June 23, 1952 3 Sheets-Sheet 1

Fig. 1

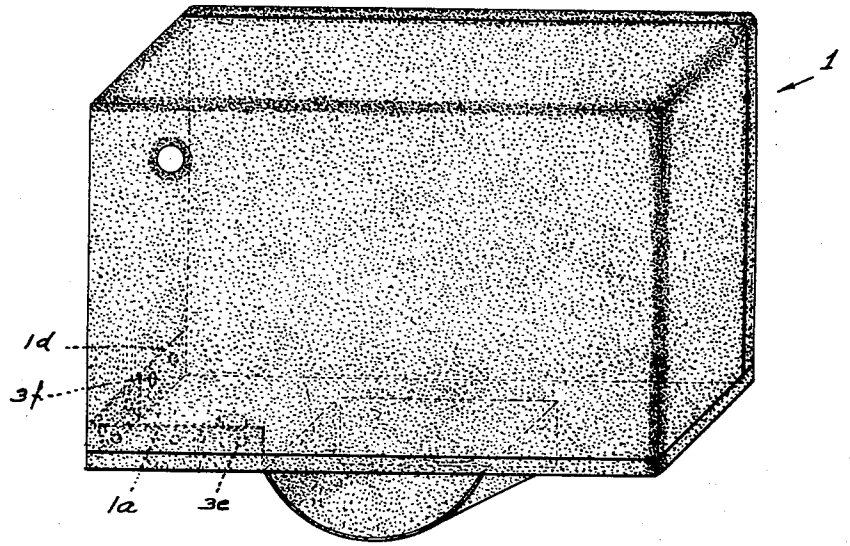
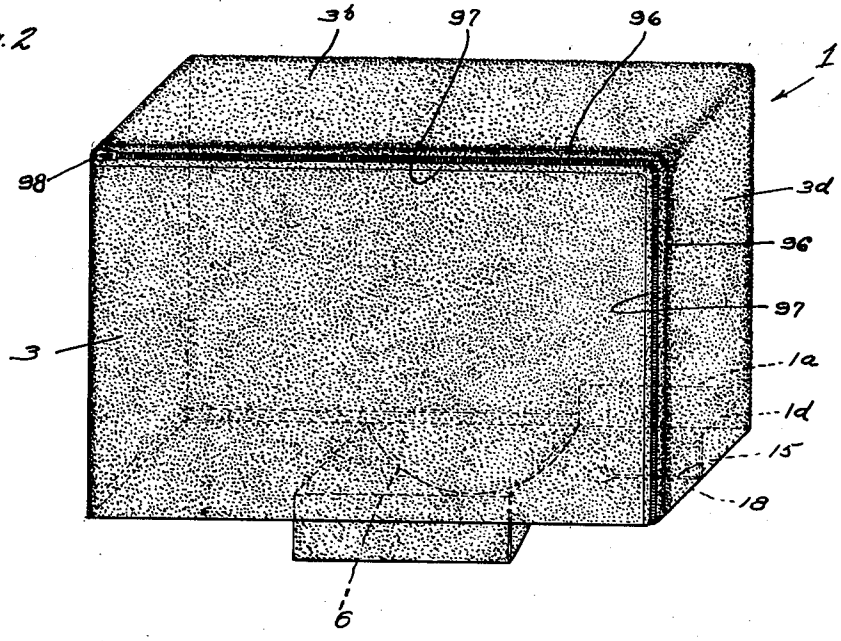


Fig. 2



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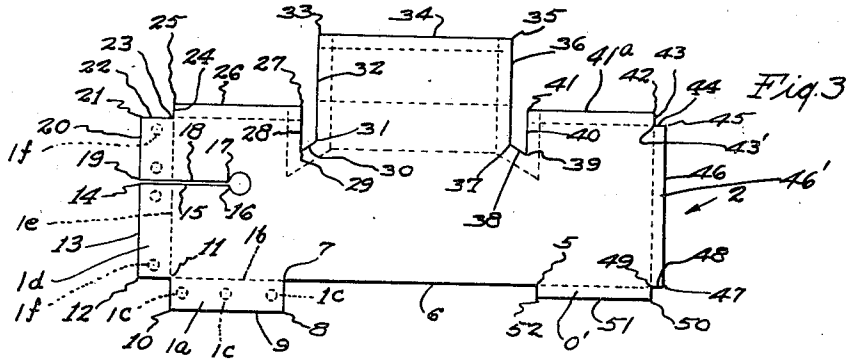


Fig. 3

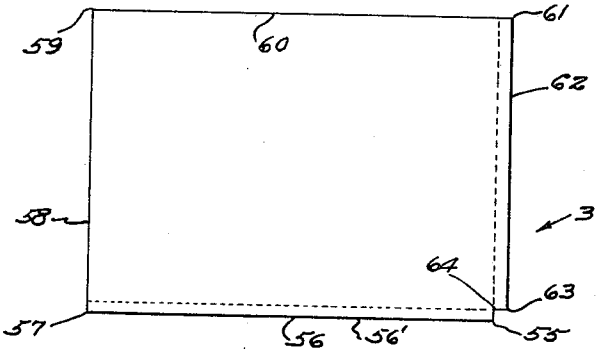


Fig. 4

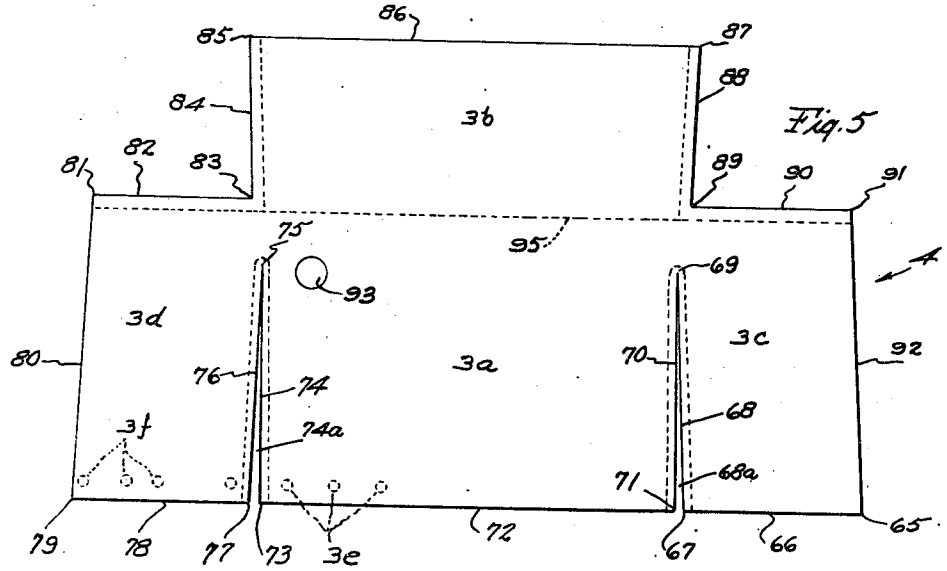


Fig. 5

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Fig. 6

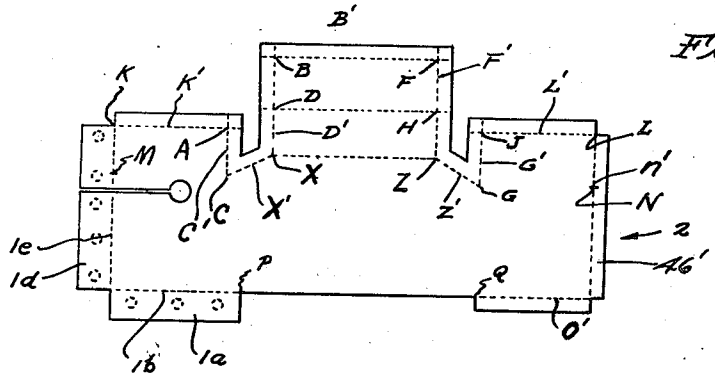
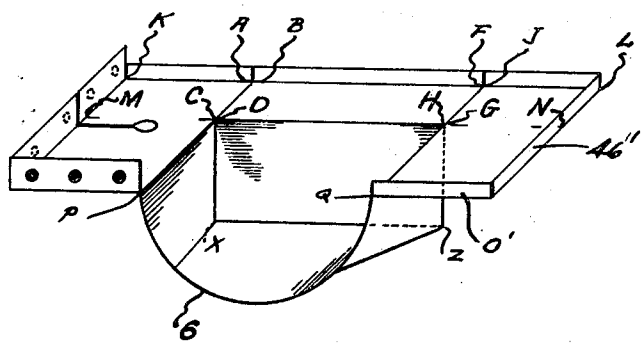


Fig. 7



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United States Patent Office 2,709,468 Patented May 31, 1955

2,709,468

NON-DRIP TOILET TANK COVER

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Application June 23, 1952, Serial No. 294,972

1 Claim. (Cl. 150—52)

In many areas it is a matter of common experience that the water reservoir for household toilets becomes covered with condensed atmospheric moisture in an amount which frequently drips therefrom causing pools of water upon the floor. This situation arises and becomes most noticeable when the incoming water is very cold and the atmosphere in the vicinity of the reservoir or tank is warm and is of high humidity. Warm moist air in contact with the chilled exterior surface of the tank results in an elemental application of the laws governing heat transfer and, as above noted, creates a profuse amount of condensate which ultimately drips upon the floor for harmful effect, and in addition thereto has the further disadvantage of causing the accessory to be generally useless as to further use for the reason that articles placed upon the top thereof become wet with the likelihood of rust, mildew and discoloration and therefore constitutes a nuisance which no longer need be condoned.

We have found that by suitably wrapping a toilet reservoir with an appropriate type water absorbent material that the formation of condensed atmospheric moisture is inhibited and, the reason thereof is due, first, to the provision of a heat insulating medium on the reservoir or tank which separates the tank from the atmosphere and, secondly, such small amount of moisture as may be condensed on the tank is absorbed by the covering and due to the relatively great extent of its evaporating surfaces as compared with the relatively small amount of condensate formed, the covering gives up its absorbed moisture to the atmosphere faster than it receives it so that as a matter of fact the tank covering is always dry within a practical meaning of the word.

In order to obtain maximum benefit from the use of this improvement it is quite important that all exterior surfaces of the tank be covered with a water absorbent material such as terry cloth and, such material may be of any suitable and/or appropriate color and/or inwoven design depending upon the taste of the user and color scheme of the environment.

Having thus laid the general premises for our invention, the object thereof may be stated as comprising the provision of harmonious and preferable decorative means to prevent and/or dissipate atmospheric moisture upon the water reservoir or tank of household toilets.

A further object of the invention resides in the provision of simple and practical lay-out segments of the cover as a whole whereby upon bringing the said segments of the cover together they form an efficient insulating surface for the whole of the tank upon which it is installed.

A feature and advantage of the invention resides in the ease and general facility with which the cover may be installed upon or removed from a toilet reservoir for laundering and/or other purpose.

Other objects, features and advantages of the invention may be noted from a study of the attached drawing, the detailed description and the appended claims.

In the drawing of which there are three sheets:

Figure 1 is a view in isometric form of the tank cover comprising the present invention, the cover being shown unrelated to the reservoir or tank with which it would normally be associated.

Figure 2 is a similar view showing the back of the cover.

Figure 3 is a top plan view of the bottom piece of the tank cover, the piece constitutes a completed blank element ready for assembly with the other pieces thereof; and, with respect to which,

Figure 4 is an elevational view of the back panel of the completed cover; and,

Figure 5 is an elevational view of a single piece of material comprising the front, sides and top portion of the cover when assembled to comprise the article shown in Figures 1 and 2.

Figure 6 is duplicative of Figure 3 modified to the extent that here the points on the blank which are to be drawn into coincidence and the seams are shown rather than the delineation of the blank.

Figure 7 is an isometric type of figure showing the shape into which the blank shown in Figures 3 and 6 is formed upon bringing certain of the points thereon into coincidence.

The non-drip toilet reservoir cover **1** illustrated in Figures 1 and 2 is composed of the sectional blanks **2**, **3** and **4** as illustrated in Figures 3, 4 and 5. These blanks will be separately described as follows.

Blank **2** comprises an irregular rectangle having certain flap-like extensions and incisions arranged for correct fitting with the blanks **3** and **4** as will be subsequently set forth. Blank **2** is described as follows: Beginning at point **5** the edge of the blank extends in a horizontal line **6** to point **7**, thence through 90 degrees to point **8**, thence through 90 degrees in a horizontal line **9** to point **10**, thence through 90 degrees in a vertical line to point **11** which point lies in a plane coincidental with horizontal line **6**, thence through 90 degrees in a horizontal line to point **12**, thence through 90 degrees in a vertical line **13** to point **14**, thence through 90 degrees in a horizontal line **15** into the blank to point **16**, thence circularly through 360 degrees to point **17** so as to form an opening for an incoming water supply pipe, thence in a horizontal line **18** to point **19**, thence through 90 degrees in a vertical line **20** to point **21**, thence through 90 degrees in a horizontal line **22** to point **23**, thence through 90 degrees in a vertical line **24** to point **25**, thence through 90 degrees in a horizontal line **26** to point **27**, thence through 90 degrees inwardly of the blank along line **28** to point **29**, thence through approximately 60 degrees in a diagonal line **30** to point **31**, thence through approximately 120 degrees in vertical line **32** to point **33**, thence through 90 degrees and along horizontal line **34** to point **35**, thence through 90 degrees inwardly in a vertical line **36** to point **37**, thence through 60 degrees in a diagonal line **38** to point **39**, thence through 120 degrees and in a vertical line **40** to point **41**, thence through 90 degrees and in a horizontal line **41***a* to point **42**, thence through 90 degrees inwardly in a fore-shortened line **43** to point **43'**, thence through 90 degrees in a fore-shortened horizontal line **44** to point **45**, thence through 90 degrees in a vertical line **46** to point **47**, thence through 90 degrees in a fore-shortened line **48** to point **49**, thence through 90 degrees in a fore-shortened line to point **50**, thence through 90 degrees in a horizontal line **51** to point **52**, thence through 90 degrees in a fore-shortened vertical line to the point of beginning, point **5**.

Blank **3** is essentially rectangular in shape and is described as follows: beginning at point **55** the related edge of the blank extends in a horizontal line **56** to point **57**, thence through 90 degrees in a vertical line **58** to point

59, thence through 90 degrees in a horizontal line 60 to point 61, thence through 90 degrees inwardly along a vertical line 62 to point 63, thence through 90 degrees in a fore-shortened line to point 64, thence through 90 degrees and in a fore-shortened line to the beginning point 55.

Blank 4 may be described as follows: Beginning at point 65 the adjacent edge 66 extends laterally in a horizontal line to point 67, thence through an angle slightly more than 90 degrees and in a near-vertical line 68 to point 69, thence reversely through 360 degrees less an angle equal to the angular inclination of line 68 in a vertical line 70 to point 71, thence through an angle of 90 degrees and in a horizontal line 72 to point 73, thence through an angle of 90 degrees and in a vertical line 74 to point 75, thence reversely through 360 degrees less an angle equal to the angular inclination of line 68 in a near-vertical line 76 to point 77, thence through an angle in excess of 90 degrees and in a horizontal line 78 to point 79, thence through an angle less than 90 degrees and in a near-vertical line 80 to point 81, thence through an angle slightly more than 90 degrees in a horizontal line 82 to point 83, thence through an angle slightly less than 90 degrees in a near vertical line 84 to point 85, thence through an angle slightly in excess of 90 degrees and in a horizontal line 86 to point 87, thence through an angle slightly less than 90 degrees and in a near-vertical line 88 to point 89, thence through an angle slightly in excess of 90 degrees and in a horizontal line 90 to point 91, thence through an angle slightly more than 90 degrees and in a near vertical line 92 to the place of beginning at point 65.

In Figure 5 the dotted line 95 slightly spaced from but parallel with the line 72 is a folding line which divides the blank into portions 3*a* and 3*b* which in the completed article form the front and top sides respectively thereof. The angularly spaced near-vertical lines 68—70 and 74—76 define V-shaped slots 68*a* and 74*a* respectively and the material lying between the lines 68—92 and 76—80 form the side-panels 3*c* and 3*d* of the cover 1.

An aperture 93 is cut in the front panel 3*a* and is located in the upper left portion thereof to provide an opening through which a reservoir valve operating lever may extend for manual manipulation.

Referring to Figure 3: The material defined between points 7—8—10 and 11 comprises a flap 1*a* which is folded through 90 degrees to extend at right angles to the blank 1 along line 1*b* between points 7 and 11 and is provided with snap fittings 1*c* which are complementary to and cooperable with snap fitting elements 3*e* on the inner side of the lower left corner of panel 3*a* in Figure 5.

Again referring to Figure 3: The material defined between points 11—12—21 and 23 comprises a flap 1*d* which is of course split by the slot defined between lines 15 and 18, and which flap is foldable through 90 degrees along the dotted line 1*e*. Snap fittings 1*f* are secured upon the under surface of this flap and are complementary to and cooperable with snap fitting elements 3*f* on the underside and along the lower edge of the side-panel 3*d* in Figure 5.

In Figure 3 the material between points 23, 25, 27, 29, 31, 33, 35, 37, 39, 41, 42, 43', 45, 47, 49, 50, 52 and 5 and the dotted lines adjacent to and parallel therewith defines the width of a seam or turned edge along the respective edges of part 2 and, in like manner in Figure 4 the material between points 61, 63, 64, 55 and 57 and the dotted lines adjacent to and parallel therewith defines the width of the seam along the respective edges thereof, and in Figure 5 the material between points 81, 83, 85 and 87, 89 and 91 and the dotted line 95 adjacent thereto and parallel therewith defines the width of the seam along the respective edges thereof.

After the blanks 2, 3 and 4 have been cut as aforedescribed and the snap fasteners 1*c*—3*e* and 1*f*—3*f* have been installed and located upon these blanks the following steps are followed to complete the article.

Figure 6 is duplicative of Figure 3 except that in this illustration the several points are shown on the blank which are to be folded and sewed together. As previously mentioned the seams or turned edges are approximately one half inch wide and are indicated by the dotted lines K'—C'—X'—D'—B'—F'—Z'—G'—L'—N' and O'. Dotted linets 1*e* and 1*b* are bending points around which the flaps 1*d* and 1*a* are swung for snap fastening to the side and front portions of the panel shown in Figure 5.

Points K—A—C—X—D—B—F—H—Z—G—J and L are located on the blank 2 along the edges of the sewing line approximately one half inch inwardly of the outer edges of the blank. Points M and N on lines 1*e* and *n'* are on a line coinciding with a horizontal line drawn through points C and G.

Beginning at point *x*, fold and sew seams X' and D' together until points C and D coincide and continue by folding and sewing seams C' and D' until finally points A and B coincide as shown in Figure 7 and, beginning at point Z, fold and sew seams Z' and F' together until points G and H coincide and continue by folding and sewing seams G' and F' until points F and J coincide.

When seams X'—D' and C' and Z'—G' and F' are sewed together as aforementioned then points K—A—B—F—J and L fall in a horizontal line (see Figure 7) and, the seams along this line are sewed to the bottom seam 56' of the panel (blank) 3. Points M—C—D—H—G and N now fall on a line spaced from and parallel with line K—A—B—F—J and L and the material falling between these parallel lines fits under the bottom of the tank from the rear edge thereof to the back edge of the bowl projection through which water flows from the tank to the toilet bowl for flushing.

Points C—D coincide as do points G—H and, the line between these points curves downward in sufficient amount to envelop the above mentioned projection of the toilet bowl and, as a consequence the area bounded within the points C—D—P and G—H—Q form a curved pocket as shown at 6 whereby the bowl projection is completely yet snugly covered. The bowl projection hereinbefore referred to, as well as the toilet bowl are not shown for the reason that they are conventional in all respects and form no part of the invention per se.

Referring to blank 4: The edges 68—70 are sewed together and the edges 74—76 are sewed together whereby upon completion the seams extend down the respective forward corners of the tank. The edge 92 of sub-panel 3*c* is now sewed to the edge 62 of panel 3 and the edge 66 of sub-panel 3*c* is sewed to the turned material 46'. The edge 90 of sub-panel 3*c* is sewed to the edge 88 of sub-panel 3*b*. The snaps 3*e* are press engaged with complementary snap elements 1*c* on the upturned flaps and, snaps 3*f* are likewise caused to engage snap elements 1*f* on flap 1*d*. The edge 82 of the sub-panel 3*d* and the edge 84 of sub-panel 3*b* are sewed together. A slide fastener element 96 is sewed to and along the edge 80 of sub-panel 3*d* and continues along the edge 86 of sub-panel 3*b* and, complementary slide fastener element 97 is sewed to and along the edges 58 and 60 of the back panel 3 and, when thus placed in functional position are adapted in the usual manner to be joined together and released by means of the usual slide tab 98.

The preceding description is believed to be inclusive of all steps taken in the manufacture of our non-drip toilet tank cover whereby a cover is had which neatly fits over and encases all surfaces of the tank whereby the chilled surface thereof is well insulated from surrounding warm and moist atmosphere so that condensation of atmospheric moisture thereon is inhibited. Also, and as previously mentioned, the material going into the construction may be ornamented by color and inwoven design so as to harmonize with bath-room finish whereby the cover, aside from its utilitarian value, enhances the appearance of the utility and of the room in which it is situated.

The laying out of and, the bringing together of the several water absorbent cloth blanks are based upon what we believe to be standard toilet reservoir construction, however, for those installations which may vary therefrom it is believed that from the preceding description and the drawings it will be possible for those skilled in the sewing art to vary the dimensions of the blanks to meet any variation of physical requirement so that the more unusual tank may also be insulated so as to prevent condensed moisture dripping therefrom.

Having thus described our invention in its presently preferred form but without being specifically limited thereto, that which we believe to be patentable and for which we seek Letters Patent is to be determined by the following subjoined claim.

We claim:

A cover for flush tanks, including: a first piece of pre-formed fabric having a principal portion of substantially rectangular form, constituting front and top covering elements for said flush tank and provided with tabs upon ends of said front covering element, whereby covering pieces are formed for ends of the flush tank, the longitudinal top edge of the top covering element and the outer edge of one of the end tabs being fitted with one portion of a complementary slide fastener; a back cover

piece of pre-formed fabric of substantially rectangular form to provide top, bottom and side edges, one side edge thereof being sewed to one of the tabs of the first piece and having its second side and top edges fitted with the other element of said slide fastener, whereby the edge portions of the back cover piece and the first piece may be drawn together; and a bottom cover piece of preformed fabric having a major body portion of rectangular form and provided with tabs extending from the edges thereof, snap fastener elements on said last named tabs; complementary fastener elements on one of the tabs of, and on the front covering element of, the first piece; the remaining edges of the bottom cover piece being sewed to the bottom edge of the front covering element of the first fabric piece and to the bottom edge of the other tab thereof, and to the bottom edge of the back cover piece.

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