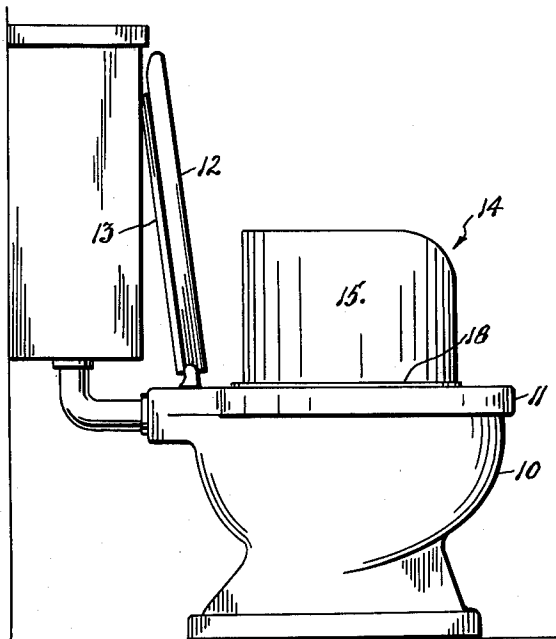


C. H. OTTO ET AL

TOILET BOWL WITH URINAL ATTACHMENT

Filed Oct. 2, 1957



FG-I.

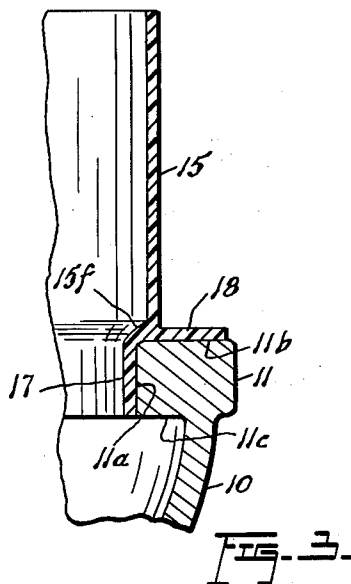


Fig. 3.

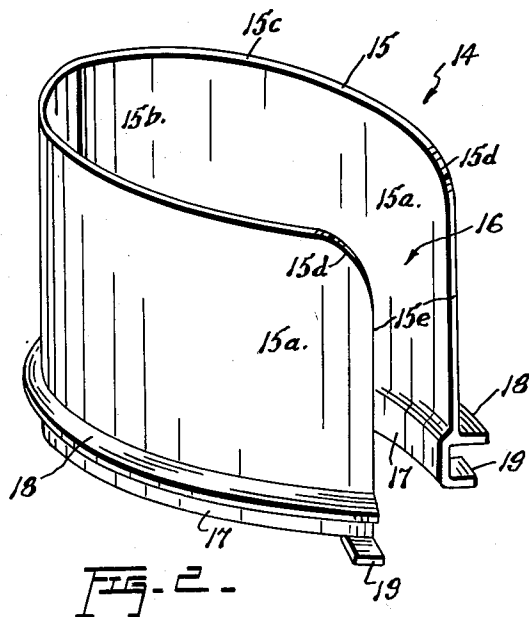


Fig. 2 -

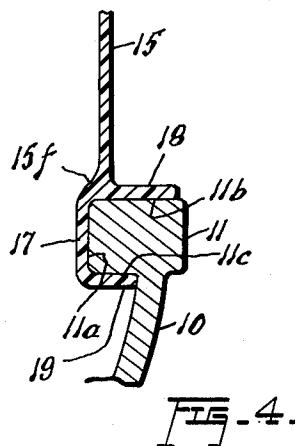


FIG-4-

Constance H. Otto
Jeanette M. Swann

INVENTORS

BY *Miriam Thane*

ATTORNEY

1

2,980,919

TOILET BOWL WITH URINAL ATTACHMENT

Constance H. Otto and Jeanette M. Swann, both of
502 5th Ave., Leavenworth, Kans.

Filed Oct. 2, 1957, Ser. No. 687,697

4 Claims. (Cl. 4—1)

This invention relates to new and useful improvements in toilet equipment, and more particularly the invention concerns itself with an attachment whereby a conventional toilet bowl may be quickly and easily converted for use as a urinal.

As such, the principal object of the invention is to avoid urinal splashing to the sides and rear of the toilet bowl and/or to the surrounding walls, which often occur when the bowl is used by male persons.

The above object is attained by the provision of an attachment in the form of an upstanding, curved shield which has an open front and is adapted to extend along the sides and rear of the usual rim at the top of a conventional toilet bowl, whereby to convert the latter into a urinal and effectively prevent the undesirable splashing to the sides and rear of the bowl, as aforesaid.

An important feature of the invention resides in forming the shield so that by virtue of inherent resiliency the side portions thereof are urged laterally outwardly and into frictional engagement with the inside of the toilet bowl rim, whereby to sustain the shield in position thereon yet facilitate quick and easy removal thereof, when desired.

Another important feature of the invention resides in providing the lower edge portion of the shield with an outwardly projecting flange which is adapted to be seated on top of the bowl rim to prevent any possibility of the shield shifting too far downwardly into the bowl.

Another feature of the invention resides in providing the shield at the lower edge of its resiliently yieldable side portions with outturned detents which engage the underside of the bowl rim when the side portions are expanded into frictional engagement with the rim, so as to prevent accidental withdrawal of the shield from the bowl and permit such withdrawal only when the resiliently urged side portions are pressed toward each other and the detents are withdrawn from the underside of the rim.

Some of the advantages of the invention reside in its simplicity of construction, efficient operation, in its durability and in its adaptability to economical manufacture.

With the above more important objects and features in view and such other objects and features as may become apparent as this specification proceeds, the invention will be understood from the following description taken in conjunction with the accompanying drawings, wherein like characters of reference are used to designate like parts, and wherein for illustrative purposes:

Figure 1 is a side elevational view of a urinal attachment in accordance with the invention applied to a toilet bowl;

Figure 2 is a perspective view of the urinal attachment per se;

Figure 3 is a fragmentary sectional detail showing the engagement of the shield with the toilet bowl rim; and

Figure 4 is a fragmentary sectional detail, similar to

2

that shown in Figure 3 but taken in a plane at the front of the shield where the latter is provided with the rim engaging detents.

Referring now to the accompanying drawings in detail, the reference numeral 10 designates a conventional toilet bowl provided at its upper edge with a rim 11 and also equipped with the usual seat 12 and seat cover 13, all in accordance with customary practice.

The invention resides in the provision of a urinal attachment which is designated generally by the reference numeral 14 and which is in the form of a curved, upstanding shield 15 having an open front 16 and including a pair of side portions 15a and a rear portion 15b.

If desired, the upper edge 15c of the shield may be rounded as shown at 15d to merge into the vertical edges 15e at the open front of the shield, and the lower edge portion of the shield is offset inwardly somewhat as indicated at 15f, so as to provide a depending lip 17.

The shield 15, particularly the lip 17 thereof, is shaped to conform substantially to and extend along the inside edge 11a of the side and rear portions of the bowl rim 11 and the material from which the shield is formed is such as to endow the shield with inherent resiliency whereby the side portions 15a thereof are urged outwardly and the rim 17 is correspondingly urged into frictional engagement with the inside edge 11a of the bowl rim. It will be apparent that in this manner the entire shield may be firmly retained in position on the toilet bowl, but may be readily removed therefrom by pressing the side portions 15a toward each other and thereby releasing the frictional engagement of the lip 17 with the rim 11.

A horizontal flange 18, extending continuously around the side and rear portions 15a, 15b of the shield, projects outwardly therefrom in a plane adjacent the lower edge of the shield, preferably at or near the aforementioned offset 15f, as shown. This flange is adapted to be seated on the top edge 11b of the bowl rim 11 and thereby prevent the shield from tilting, downward sliding, or becoming otherwise displaced on the bowl.

Finally, a pair of outturned, hook-shaped detents 19 are provided at the lower edge of the lip 17 at the front of the side portions 15a. These detents are adapted to engage the underside 11c of the rim 11 when the shield is resiliently expanded into engagement with the rim, so as to prevent the shield from being accidentally withdrawn from the bowl. However, when the side portions 15a of the shield are pressed together as aforesaid, the detents 19 are withdrawn from under the rim and expeditious removal of the entire shield from the bowl is facilitated.

The shield is preferably made from stain-resistant synthetic plastic material by a molding process whereby the lip 17, the flange 18 and the detents 19 are formed integrally with the shield body.

It is to be noted that by applying the shield attachment directly to the rim of the toilet bowl rather than to the toilet seat 12, it is necessary to raise the seat out of the way preparatory to the use of the attachment. This feature provides desirable training for raising of the seat prior to the use of the urinal, especially in the instance of small boys.

While in the foregoing there has been described and shown the preferred embodiment of the invention, various modifications may become apparent to those skilled in the art to which the invention relates. Accordingly, it is not desired to limit the invention to this disclosure, and various modifications may be resorted to, such as may lie within the spirit and scope of the appended claims.

What is claimed as new is:

1. The combination of a toilet bowl and a urinal

3

attachment for use by a person standing in front of said bowl, said attachment comprising a curved upstanding shield extending along the rear and fully along the sides of said bowl and having an open front whereby the sides of the shield terminate in opposed edges completely free of each other and spaced apart transversely of the front of the bowl leaving the front of the bowl unobstructed by said shield, said shield being formed from material possessing sufficient inherent resiliency whereby the free side portions thereof may be drawn together and resiliently urged apart, the lower edge portion of said shield being disposed within the upper portion of said bowl and frictionally retained therein by the tendency of the side portions to resiliently spread apart, whereby to removably retain the shield in position on the bowl.

2. The device as defined in claim 1 together with a laterally outwardly projecting flange provided adjacent the lower edge of said shield and seated on top of said bowl, the ends of said flange being co-terminal with said free edges of the shield.

3. The device as defined in claim 1 together with a laterally outwardly projecting flange provided adjacent the lower edge of said shield and seated on top of said bowl, the ends of said flange being co-terminal with said free edges of the shield, and outturned detents provided at and projecting laterally from the lower edge

4

of the shield, said detents engaging the upper portion of the bowl in a plane spaced downwardly from said flange.

4. The combination of a toilet bowl having a continuous rim at the top thereof, and a urinal attachment for use by a person standing in front of said bowl, said attachment comprising a curved upstanding shield having a lower edge portion disposed within said rim and extending along the rear and fully along the sides of the rim, said shield having an open front whereby the sides of the shield terminate in opposed edges completely free of each other and spaced apart transversely of the front of the bowl leaving the front of the bowl unobstructed by the shield, and a laterally outwardly projecting flange provided on the lower edge portion of said shield and seated on the upper edge of said rim.

References Cited in the file of this patent

UNITED STATES PATENTS

D. 148,512	Zuckerman	Jan. 27, 1948
2,294,349	Muller	Aug. 25, 1942
2,489,967	Lavine	Nov. 29, 1949
2,577,028	McMorrow	Dec. 4, 1951
2,583,718	Walls	Jan. 29, 1952
2,719,305	LaHue	Oct. 4, 1955
2,791,780	Krischer	May 14, 1957