Oct. 15, 1940. C. K. WOODIN 2,218,276

SEDIMENT PLATE

Filed Oct. 21, 1937

Fig. 1

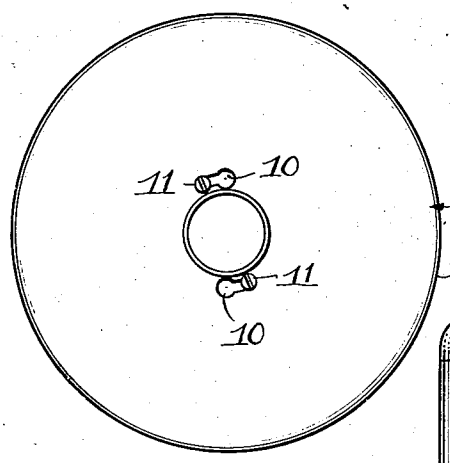
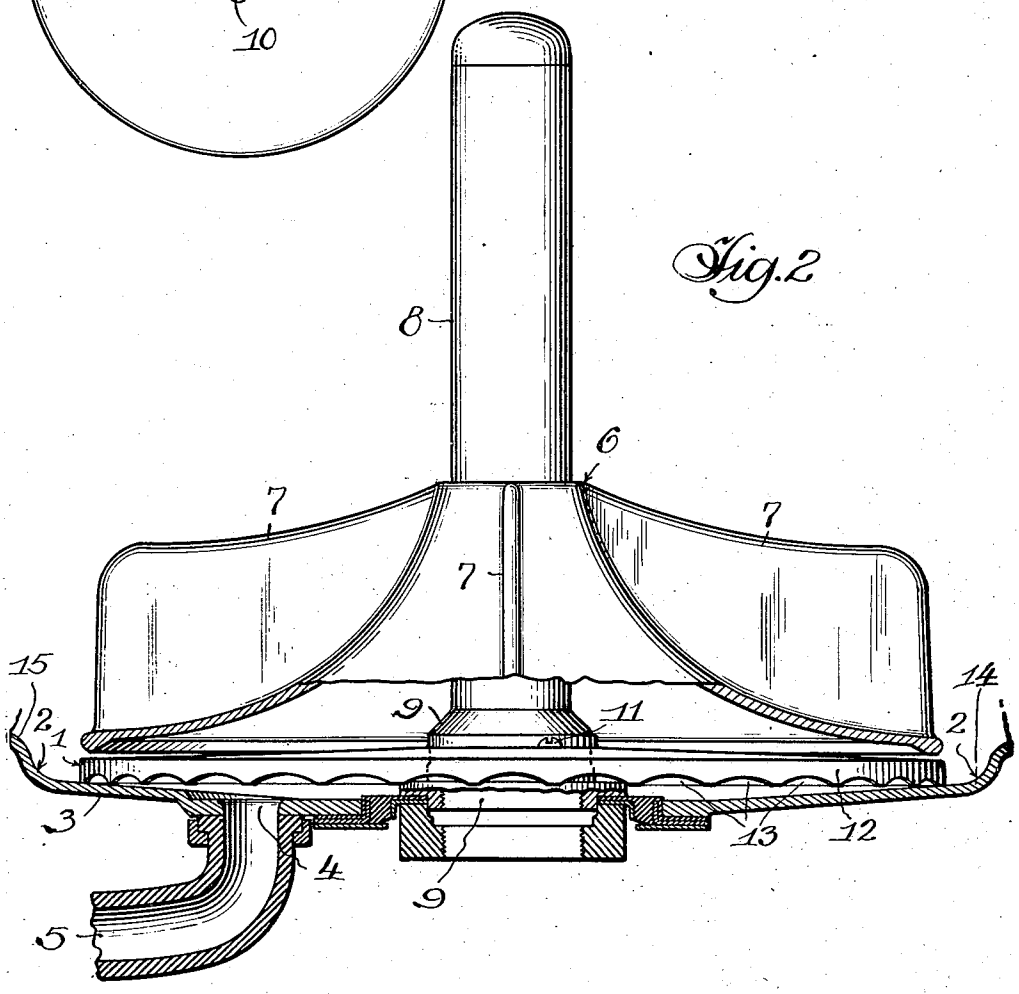



Fig. 2




INVENTOR.
Charles K. Woodin
BY
Parkinson & Lane.
ATTORNEYS.

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## SEDIMENT PLATE

Charles K. Woodin, Newton, Iowa, assignor to The Maytag Company, Newton, Iowa, a corporation of Delaware

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1 Claim. (Cl. 210—170)

The present invention relates to sediment plates and more particularly to a novel drain member for washing machines and the like.

In washing machines, and more particularly those employing an agitator or liquid impeller mounted upon an upstanding center post in the bottom of the tub and provided with a drain means for draining off the washing liquid, considerable difficulty is encountered in preventing the drain pumps and drain cocks or drain hose from becoming clogged with foreign material such as lint, buttons, pins, etc. Generally a perforated strainer is employed and placed over the drain opening but due to its arrangement and the fact that the openings or perforations are usually of a size or diameter small enough to prevent objects of clogging size to pass therethrough and enter the drain system and/or pump, these perforations become readily clogged and then in order to properly drain the tub, it is necessary to remove the agitator and plate and laboriously clear the openings by picking out the lint or other foreign particles collected therein.

It is an important object of the present invention to provide a sediment plate or strainer which will effectively drain the wash water and at the same time prevent foreign particles from entering and clogging the drain system, and which plate or strainer may be quickly and conveniently cleared of lint.

A further object is to provide a drain plate adapted to seat in a recess or depression in the tub and provide an annular channel about the periphery or edge of the drain or sediment plate in which foreign particles are caught and retained. It has been found that the lint that usually collects in a washing operation collects in this annular channel or recess and ordinarily this lint may be removed by merely running the fingers around the recess. However, for a complete cleaning of the collected foreign particles, the strainer or sediment plate is preferably removed and any lint or other foreign particles caught in the scalloped or serrated edges of the plate will drop therefrom. This permits a more convenient and effective cleaning of the collected lint and other foreign particles than where such lint or other particles become lodged in openings or perforations as in the previous forms of drain plates.

A still further object is to provide a novel construction of sediment plate or strainer formed with a downwardly extending peripheral flange having its lower edge scalloped or notched to provide drain openings.

Further objects, advantages and capabilities will be apparent from the disclosure or are inherent in the device.

In the drawing:

Fig. 1 is a plan view of the novel sediment or drain plate.

Fig. 2 is a fragmentary view, part in side elevation and part in vertical cross section, of a washing machine equipped with the novel sediment or drain plate.

Referring to the embodiment disclosed in the drawing, the novel drain or sediment plate 1 is shown positioned in a recess or depression 2 provided in the bottom or base 3 of a washing machine tub. In the lowermost portion of the bottom of this tub is provided a drain opening 4 emptying into a drain hose 5 leading to the usual drain pump or other drain means.

The drain or sediment plate 1 is shown as positioned below an agitator or impeller 6 having liquid impelling vanes 7 and a hollow high center post 8 adapted to receive a stationary sleeve 9 for a drive shaft. The drain plate is adapted to be readily mounted over the sleeve 9 and locked in its assembled position in the bottom of the tub by means of a pair of bayonet slots 10 formed in the upper surface of the plate and adapted to receive and lock with screws or upstanding locking projections 11 in a manner disclosed in Fig. 1. This plate is formed or provided with a peripheral flange 12 having its lower edge scalloped or serrated as at 13 to permit drainage of the washing liquid but preventing the passage therethrough of lint or other foreign particles which collect in the annular channel 14 formed between the flange 12 and shoulder 15 of the depression or recess 2 in the bottom of the tub.

As clearly disclosed in Fig. 2, the scallops or serrations in the lower edge 13 of the peripheral flange 12 are relatively shallow in depth so as to prevent the passage therethrough of particles which would obstruct or clog the drain means, but are of a sufficient effective area as to permit a complete and ready drainage of the washing liquid.

From the above description and the disclosure in the drawing, it will be apparent that the novel invention contemplates a sediment or drain plate which is efficient in operation, effectively prevents clogging of the drain pump or drain system, while at the same time it offers but little resistance to the discharge of the washing liquid. Any lint or foreign particles collected in the peculiarly shaped and arranged openings may be readily removed.

Due to the size of the strainer or drain plate and its location in relation to the base of the agitator, there is no danger of clothes being caught or wedged in beneath the agitator and the adjacent parts of the agitator and tub.

Having thus disclosed the invention,

I claim:

A drain member for a washing machine tub provided with an agitator mounted on a shaft extending through the bottom of the tub, said tub having a depression below the agitator provided with a sediment trap, comprising a substantially imperforate plate adapted to be mounted in the depression and of a diameter substantially the same as that of the base of the agitator, a downwardly projecting peripheral flange on said plate provided with a plurality of recesses for permitting drainage of water therethrough to drain the tub but obstructing the passage of foreign particles, whereby the foreign particles may be readily removed from the plate after the tub is drained, the plate being located directly under and closely adjacent the agitator and its periphery being spaced from the side walls of the depression to form an annular channel providing a sediment zone, whereby the plate may be cleaned and the foreign matter may be removed from the tub without removal of the agitator or plate.

CHARLES K. WOODIN.